

STIC Search Report Biotech-Chem Library

STIC Database Tracking Number: 112348

To: Karen A Lacourciere

Location: REM-2D15

Art Unit: 1635

Wednesday, January 21, 2004

Case Serial Number: 09/423035

From: Beverly Shears Location: Remsen Bldg.

RM 1A54

Phone: 571-272-2528

beverly.shears@uspto.gov

Search Notes





STIC-Biotech/ChemLib

112348

From:

Lacourciere, Karen

Sent:

Friday, January 16, 2004 2:13 PM

To: Subject: STIC-Biotech/ChemLib Sequence search 09/423,035

Please search SEQ ID NO:122 and 121 for 09/423,035 in the commercial databases. Please length limit the search to hits less than 100 nucleotides in length.

Thanks-Karen

Karen A. Lacourciere Ph. D. Remsen 2D15 GAU 1635 (571) 272-0759 CREX

Searcher:	
Phone:	
Location:	
Date Picked Up:	
Date Completed:	
Searcher Prep/Review:	
Clerical:	
Online time:	

TYPE OF SEARCH:
NA Sequences:
AA Sequences:
Structures:
Bibliographic:
Litigation:
Full text:
Patent Family:
Other:

'ENDOR/COST (where applic.)
STN:
DIALOG:
Questel/Orbit:
DRLink:
Lexis/Nexis:
Sequence Sys.:
WWW/Internet:
Other (specify):

U.S. DEPARTMENT OF COMMERCE Patent and Trademark Office

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PTO-1590 (9-90)

FILE 'REGISTRY' ENTERED AT 12:29:20 ON 21 JAN 2004 L1 37479 S RGGCTAGC[HT]ACAACGA/SQSN

L7 37 S L1 AND SQL=<20

FILE 'HCAPLUS' ENTERED AT 12:39:58 ON 21 JAN 2004 L8 26 S L7

L8 ANSWER 1 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:1007150 HCAPLUS

TITLE:

Antisense oligonucleotides against the PIM1 gene

for use in analgesia

INVENTOR(S):

Altan, Oezlem; Kurreck, Jens; Gruenweller,

Arnold; Erdmann, Volker

PATENT ASSIGNEE(S):

Gruenenthal G.m.b.H., Germany

SOURCE:

PCT Int. Appl., 37 pp. CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.			KI	ND	ID DATE			APPLICATION NO					DATE				
WO	WO 2003106681				2	2003	1224		WO 2003-EP6158					20030612			
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		CN,	CO,	CR,	CU,	CZ,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,	GE,	
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		NZ,	OM,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	ТJ,	TM,	
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		ΑZ,	BY,	KG,	ΚZ,	MD,	RU,	ТJ,	MT								
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		GA,	GN,	GQ,	GW,	ML,	MR,	NE,	SN,	TD,	TG						

PRIORITY APPLN. INFO.:

DE 2002-10226702 A 20020614

AB Antisense DNA for use in inhibiting expression of the PIM1 gene are described for use in the diagnosis and control of PIM1 kinase-mediated pain perception. Use of PIM1 antisense oligonucleotides injected into the spinal cord to increase the threshold of pain perception is demonstrated in rat.

IT 638223-95-7

RL: PRP (Properties)

(unclaimed nucleotide sequence; antisense oligonucleotides against the PIM1 gene for use in analgesia)

L8 ANSWER 2 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:971390 HCAPLUS

DOCUMENT NUMBER:

140:26917

TITLE:

Antibodies having specificity for

2'-deoxy-2'-C-allyl uridine-containing nucleic acids, and their use in detecting and monitoring therapeutic nucleic acid molecules in mammalian

biological samples

INVENTOR(S):

Radka, Susan; Beigelman, Leonid; Peter, Haeberli

PATENT ASSIGNEE(S):

USA

Searcher : Shears 571-272-2528

SOURCE: U.S. Pat. Appl. Publ., 38 pp.

CODEN: USXXCO

DOCUMENT TYPE:

Patent English

LANGUAGE:

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

KIND DATE APPLICATION NO. DATE PATENT NO. -----20030212 US 2003228590 A1 20031211 US 2003-366191 US 2002-356298P P 20020213 PRIORITY APPLN. INFO.: The present invention relates to antibodies, antibody conjugates, and compns. thereof, methods of antibody synthesis, and applications of antibodies useful for the in vivo-detection of nucleic acid mols. containing 2'-deoxy-2'-C-allyl Uridine, such as in a clin. setting. The antibodies of the invention are also useful as screening agents which allow the selection of candidate therapeutic mols. for optimum bioavailability and/or activity, and as agents for cell and tissue specific-delivery of nucleic acid mols. The example discloses the development of a monoclonal antibody, CAIUSR, and its use for detection of the ANGIOZYME® ribozyme therapeutic in vivo. This antibody was developed for use in monitoring clin. trials of ANGIOZYME.

ΙT 633370-08-8

RL: PRP (Properties)

(unclaimed nucleotide sequence; antibodies having specificity for 2'-deoxy-2'-C-allyl uridine-containing nucleic acids, and their use in detecting and monitoring therapeutic nucleic acid mols. in mammalian biol. samples)

ANSWER 3 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN L8

ACCESSION NUMBER:

2003:855650 HCAPLUS

DOCUMENT NUMBER:

139:317479

TITLE:

Nucleic acid-based modulation of NOGO and NOGO

receptor interactions and genes for treatment

and/or diagnosis of associated diseases Blatt, Lawrence; McSwiggen, James; Chowrira,

Bharat M.; Haeberli, Peter

PATENT ASSIGNEE(S):

SOURCE:

Ribozyme Pharmaceuticals, Inc., USA

U.S. Pat. Appl. Publ., 77 pp., Cont.-in-part of

Appl. No. PCT/US02/10512.

CODEN: USXXCO

DOCUMENT TYPE:

INVENTOR(S):

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT: 12

PATENT INFORMATION:

PATENT NO.	KIND DATE	APPLICATION NO.	DATE				
US 2003203870	A1 200310	30 US 2003-430882	20030506				
WO 2001059103	A2 200108	.6 WO 2001-US4273	20010209				
WO 2001059103	A3 200206	20020613					
WO 2001059103	C2 200210:	<u>:</u> 4					
W: AE, AG,	AL, AM, AT, A	J, AZ, BA, BB, BG, BR, BY,	, BZ, CA, CH,				
		K, DM, DZ, EE, ES, FI, GB,					
		, IS, JP, KE, KG, KP, KR,					
		A, MD, MG, MK, MN, MW, MX,					
PL, PT,	RO, RU, SD, SI	E, SG, SI, SK, SL, TJ, TM,	, TR, TT, TZ,				

571-272-2528 Searcher : Shears

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UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU,
              TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE,
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                                              US 2001-780533
                                                                 20010209
     US 2003060611
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                              20030619
                                              US 2001-827395
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     US 2003113891
     WO 2002081628
                                              WO 2002-US10512
                         A2
                              20021017
                                                                 20020403
     WO 2002081628
                         A3
                              20030220
                         C1
                              20030828
     WO 2002081628
              AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH,
              CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD,
              GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ,
              NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM,
              AZ, BY, KG, KZ, MD, RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE,
              CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT,
              SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE,
              SN, TD, TG
                                           US 2000-181797P P 20000211
PRIORITY APPLN. INFO.:
                                                              B2 20010209
                                           US 2001-780533
                                           WO 2001-US4273
                                                              A2 20010209
                                           US 2001-827395
                                                              B1 20010405
                                           WO 2002-US10512
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                                           US 2001-294412P
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                                           US 2001-315315P
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                                                                 20010828
     The present invention relates to nucleic acid mols., including
AB
     aptamers and antisense and enzymic nucleic acid mols., such as
     hammerhead ribozymes, DNAzymes, and antisense oligonucleotides,
     which modulate the expression of NOGO and NOGO receptor genes.
     particular, novel nucleic acid-based techniques are provided to
     inhibit the expression of NOGO-A, NOGO-B, and/or NOGO-C, NOGO-66
     receptor, and/or NI-250, myelin-associated glycoprotein, tenascin-R,
     and NG-2. The sequence of human NOGO and NOGO receptor genes are
     screened for accessible sites using a computer-folding algorithm;
     regions of the RNA that do not form secondary folding structures and
     contain potential enzymic nucleic acid mol and/or antisense
     binding/cleaving sites are identified. The nucleic acids of the
     present invention can be used to treat a patient having a condition
     associated with the level of NOGO or NOGO receptor.
IT
     613321-58-7
     RL: PRP (Properties)
         (unclaimed nucleotide sequence; nucleic acid-based modulation of
        NOGO and NOGO receptor interactions and genes for treatment
        and/or diagnosis of associated diseases)
     ANSWER 4 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN
^{\rm L8}
                           2003:731500 HCAPLUS
ACCESSION NUMBER:
                           139:224402
DOCUMENT NUMBER:
                           Enzymatic nucleic acid treatment of diseases or
TITLE:
                           conditions related to hepatitis C virus
                           infection
                           Blatt, Lawrence; McSwiggen, James; Roberts,
INVENTOR(S):
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Searcher: Shears 571-272-2528

Elisabeth; Pavco, Pamela A.; MacJack, Dennis

PATENT ASSIGNEE(S): US

USA

SOURCE:

U.S. Pat. Appl. Publ., 172 pp., Cont.-in-part of

U.S. Ser. No. 740,332.

CODEN: USXXCO

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

104

PATENT INFORMATION:

KIND DATE APPLICATION NO. DATE PATENT NO. _____ ----US 2001-817879 20010326 US 2003171311 A1 20030911 A1 AU 1998-51819 19980112 AU 9851819 19980611 B2 20010208 AU 729657 US 1999-274553 19990323 A1 20020627 US 2002082225 A1 19990916 AU 1999-39188 19990713 AU 9939188 US 2000-504231 20000215 US 2002013458 A1 20020131 20001218 US 2003125270 20030703 US 2000-740332 A1 US 1998-83217P P 19980427 PRIORITY APPLN. INFO.: US 1998-100842P P 19980918 B2 19990225 US 1999-257608 US 1999-274553 A2 19990323 A2 20000215 US 2000-504231 A2 20000707 US 2000-611931 US 2000-740332 A2 20001218 AU 1995-26422 A3 19950518 US 1996-623891 A 19960325

This invention relates to enzymic nucleic acid mols. (e.g., AΒ ribozymes and DNAzymes) directed to cleave RNA species of hepatitis C virus (HCV) and/or encoded by the HCV. Specifically, the present invention describes enzymic nucleic acid mols. that would cleave in the conserved regions of the HCV genome. In a preferred embodiment, the invention features the use of an enzymic nucleic acid mol., preferably in the hammerhead, Inozyme (NCH), G-cleaver, Amberzyme, Zinzyme and/or DNAzyme motif, to inhibit the expression and/or replication of HCV. Chemical modifications in the sugar, base, and/or phosphate backbones of these enzymic nucleic acids is carried out to improve their stability. Such enzymic nucleic acid mols. may be used to treat diseases associated with HCV infection. Ribozymes in combination with interferons and polyethylene glycol interferons which have the potential to improve the effectiveness of treatment of HCV are also described. [This abstract record is one of two records for this document necessitated by the large number of index entries required to fully index the document and publication system constraints.].

IT 591261-44-8

RL: PRP (Properties)

(unclaimed nucleotide sequence; enzymic nucleic acid treatment of diseases or conditions related to hepatitis C virus infection)

L8 ANSWER 5 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:568525 HCAPLUS

DOCUMENT NUMBER:

139:358722

TITLE:

Enzymatic nucleic acid treatment of diseases or

conditions related to hepatitis C virus

infection

INVENTOR(S):

Blatt, Lawrence; McSwiggen, James; Roberts,

Searcher : Shears 571-272-2528

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Elisabeth; Pavco, Pamela A.; Macejack, Dennis

PATENT ASSIGNEE(S): U

USA

SOURCE:

U.S. Pat. Appl. Publ., 198 pp.

CODEN: USXXCO

DOCUMENT TYPE:

Patent English

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

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PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO. DATE
US 2003125270 AU 9851819 AU 729657	A1 A1 B2	20030703 19980611 20010208	US 2000-740332 20001218 AU 1998-51819 19980112
AU 9939188 US 2003125270 PRIORITY APPLN. INFO.:	A1 A1	19990916 20030703	AU 1999-39188 19990713 US 2000-740332 20001218 US 2000-740332 A 20001218
PRIORITI ALLEN. INCO.	•	•	AU 1995-26422 A3 19950518 US 1996-623891 A 19960325

This invention relates to enzymic nucleic acid mols. (e.g., AΒ ribozymes and DNAzymes) directed to cleave RNA species of hepatitis C virus (HCV) and/or encoded by the HCV. Specifically, the present invention describes enzymic nucleic acid mols. that would cleave in the conserved regions of the HCV genome. In a preferred embodiment, the invention features the use of an enzymic nucleic acid mol., preferably in the hammerhead, Inozyme (NCH), G-cleaver, amberzyme, zinzyme and/or DNAzyme motif, to inhibit the expression and/or replication of HCV. Chemical modifications in the sugar, base, and/or phosphate backbones of these enzymic nucleic acids is carried out to improve their stability. Such enzymic nucleic acid mols. may be used to treat diseases associated with HCV infection. Ribozymes in combination with interferons and polyethylene glycol interferons which have the potential to improve the effectiveness of treatment of HCV are also described. [This abstract record is one of two records for this document necessitated by the large number of index entries required to fully index the document and publication system constraints.].

IT 557143-59-6

RL: PRP (Properties)

(unclaimed nucleotide sequence; enzymic nucleic acid treatment of diseases or conditions related to hepatitis C virus infection)

L8 ANSWER 6 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:309404 HCAPLUS

DOCUMENT NUMBER:

139:143909

TITLE:

Enzymatic nucleic acid treatment of diseases or

conditions related to levels of epidermal growth

factor receptors

INVENTOR(S):

Akhtar, Saghir; McSwiggen, James

PATENT ASSIGNEE(S):

Kuwait

SOURCE:

U.S. Pat. Appl. Publ., 199 pp., Cont.-in-part of

U.S. Ser. No. 401,063.

CODEN: USXXCO

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

104

PATENT INFORMATION:

Searcher: Shears 571-272-2528

PATENT NO.	KIND	DATE	APPLICATION NO. DATE
US 2003073207 US 6057156	A1 A	20030417 20000502	US 2001-848754 20010503 US 1997-985162 19971204
AU 9851819 AU 729657	A1 B2	19980611 20010208	AU 1998-51819 19980112
AU 9939188 US 6623962	A1 B1	19990916 20030923	AU 1999-39188 19990713 US 1999-401063 19990922
PRIORITY APPLN. INFO.	:		US 1997-36476P P 19970131 US 1997-985162 A1 19971204
			US 1999-401063 A2 19990922 AU 1995-26422 A3 19950518
			US 1996-623891 A 19960325

AB The present invention relates to nucleic acid mols., including antisense and enzymic nucleic acid mols., such as hammerhead ribozymes, DNAzymes, allozymes and antisense, which modulate the expression of epidermal growth factor receptor genes. The sequence of human epidermal growth factor receptor (EGFR) gene is screened for accessible sites using a computer-folding algorithm. the RNA that do not form secondary folding structures and contain potential enzymic nucleic acid mol. and/or antisense binding/cleavage sites are identified and used to design the complementary regions of the antisense and enzymic nucleic acid Two human cell lines, A549 lung carcinoma cells and SKOV3 mols. ovarian carcinoma cells known to express medium to high levels of EGFR protein, are used in anti-proliferation assays for nucleic acid screening. The invention designs, synthesizes and tests nucleic acid mols. that target both EGFR and HER2 RNA in cell proliferation and RNA reduction assays for potential use in treating cancer. abstract record is one of two records for this document necessitated by the large number of index entries required to fully index the document and publication system constraints.].

IT 506617-43-2

RL: PRP (Properties)

(unclaimed nucleotide sequence; enzymic nucleic acid treatment of diseases or conditions related to levels of epidermal growth factor receptors)

L8 ANSWER 7 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2003:261042 HCAPLUS

DOCUMENT NUMBER:

138:282290

TITLE:

Methods and kits containing nucleic acid-based

enzymes for detection of single nucleotide

polymorphisms in diagnosis of diseases

INVENTOR(S):

Usman, Nassim; McSwiggen, James A.; Zinnen, Shawn; Seiwert, Scott; Haeberli, Peter;

Chowrira, Bharat; Blatt, Lawrence; Vaish,

Narendra K.

PATENT ASSIGNEE(S):

USA

SOURCE:

U.S. Pat. Appl. Publ., 116 pp., Cont.-in-part of

U.S. Ser. No. 992,160.

CODEN: USXXCO

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT: PATENT INFORMATION:

PATENT NO.

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KIND DATE

APPLICATION NO. DATE

Searcher :

Shears

571-272-2528

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PRIORITY APPLN. INFO.:
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                                              US 2002-286492
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                                              WO 2002-US35529 A2 20021105
     Nucleic acid sensor mols. and methods are provided for the detection
AB
     and amplification of signaling agents using enzymic nucleic acid
     constructs, including hammerhead enzymic nucleic acid mols.,
      inozymes, G-cleaver enzymic nucleic acid mols., zinzymes, amberzymes
     and DNAzymes. Also provided are kits for detection and amplification. The nucleic acid sensor mols., methods and kits
     provided herein can be used in diagnostics, nucleic acid circuits,
     nucleic acid computers, therapeutics, target validation, target
     discovery, drug optimization, single nucleotide polymorphism (SNP)
     detection, single nucleotide polymorphism (SNP) scoring, and
     proteome scoring as well as other uses described herein.
IT
     504513-55-7
     RL: PRP (Properties)
         (unclaimed nucleotide sequence; methods and kits containing nucleic
         acid-based enzymes for detection of single nucleotide
         polymorphisms in diagnosis of diseases)
     ANSWER 8 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN
1.8
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Searcher: Shears 571-272-2528

2003:261013 HCAPLUS

ACCESSION NUMBER:

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DOCUMENT NUMBER:
                         138:292713
TITLE:
                         Enzymatic nucleic acid treatment of diseases or
                         conditions related to levels of epidermal growth
                         factor receptors
                         Akhtar, Saghir; McSwiggen, James
INVENTOR(S):
                         Kuwait
PATENT ASSIGNEE(S):
                         U.S. Pat. Appl. Publ., 113 pp., Cont.-in-part of
SOURCE:
                         U.S. Ser. No. 848,754.
                         CODEN: USXXCO
DOCUMENT TYPE:
                         Patent
LANGUAGE:
                         English
FAMILY ACC. NUM. COUNT: 104
PATENT INFORMATION:
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PRIORITY APPLN. INFO.:
                                        US 1997-985162
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US 2002-251117

US 2002-277494

US 2003-440129P

A1 20020919

A1 20021021

P 20030115

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The present invention relates to nucleic acid mols., including
AB
      antisense and enzymic nucleic acid mols., such as hammerhead
      ribozymes, DNAzymes, allozymes and antisense, which modulate the
      expression of epidermal growth factor receptor genes.
IT
      503875-66-9
      RL: PAC (Pharmacological activity); PRP (Properties); THU
      (Therapeutic use); BIOL (Biological study); USES (Uses)
          (enzymic nucleic acid treatment of diseases or conditions related
          to levels of epidermal growth factor receptors)
      ANSWER 9 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN
T.R
ACCESSION NUMBER:
                                2003:76966 HCAPLUS
DOCUMENT NUMBER:
                                138:142441
                                Enzymatic nucleic acid peptide conjugates
TITLE:
                                Beigelman, Leonid; Azhayev, Alex; Azhayeva,
INVENTOR(S):
                                Elena
                                Ribozyme Pharmaceuticals, Inc., USA; Antopolsky,
PATENT ASSIGNEE(S):
                                Maxim
                                PCT Int. Appl., 88 pp.
SOURCE:
                                CODEN: PIXXD2
                                Patent
DOCUMENT TYPE:
LANGUAGE:
                                English
FAMILY ACC. NUM. COUNT:
PATENT INFORMATION:
      PATENT NO.
                                                      APPLICATION NO.
                                                                            DATE
                           KIND DATE
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      WO 2003008628
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                                                      WO 2002-US23324 20020722
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                                   20031030
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RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE,
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                                                       US 2002-201389
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      US 2003148928
                           A1 20030807
                                                   US 2001-306995P P 20010720
PRIORITY APPLN. INFO.:
OTHER SOURCE(S):
                               MARPAT 138:142441
      This invention features conjugates, compns., methods of synthesis,
      and applications thereof, including galactose, galactosamine,
      N-acetyl galactosamine, PEG, phospholipid, and human serum albumin
      (HSA) derived conjugates of nucleosides, nucleotides,
      non-nucleosides, and nucleic acids including enzymic nucleic acids,
      DNAzymes, allozymes, antisense, dsRNA, siRNA, triplex oligonucleotides, 2,5-A chimeras, decoys and aptamers.
ΙT
      493068-33-0
      RL: PRP (Properties)
          (unclaimed nucleotide sequence; enzymic nucleic acid peptide
          conjugates)
      ANSWER 10 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN
                                2003:23421 HCAPLUS
ACCESSION NUMBER:
                                138:84437
DOCUMENT NUMBER:
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Searcher: Shears 571-272-2528

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Methods and kits containing nucleic acid-based
TITLE:
                           enzymes for detection of single nucleotide
                           polymorphisms in diagnosis of diseases
                           Usman, Nassim; McSwiggen, James A.; Zinnen,
INVENTOR(S):
                           Shawn; Seiwert, Scott; Haeberli, Peter;
                           Chowrira, Bharat; Blatt, Lawrence; Vaish,
                           Narendra
PATENT ASSIGNEE(S):
                           USA
                           U.S. Pat. Appl. Publ., 100 pp., Cont.-in-part of U.S. Pat. Appl. 2002 102,568.
SOURCE:
                           CODEN: USXXCO
DOCUMENT TYPE:
                           Patent
LANGUAGE:
                           English
FAMILY ACC. NUM. COUNT:
                           12
PATENT INFORMATION:
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                        KIND DATE
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                                               US 2003-422050
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                        A1 20040115
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PRIORITY APPLN. INFO .:
                                                              A2 20010306
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                                            WO 2002-US35529 A2 20021105
     The present invention provides nucleic acid sensor mols. and methods
AB
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for the detection and amplification of signaling agents using

enzymic nucleic acid constructs. These include hammerhead enzymic nucleic acid mols., inozymes, G-cleaver enzymic nucleic acid mols., zinzymes, amberzymes and DNAzymes. Kits for detection and amplification and uses of the invention in diagnostics, nucleic acid circuits, nucleic acid computers, therapeutics, target validation, target discovery, drug optimization, SNP detection, SNP scoring, proteome scoring and other uses are disclosed.

IT 483392-16-1

RL: PRP (Properties)

(unclaimed nucleotide sequence; methods and kits containing nucleic acid-based enzymes for detection of single nucleotide polymorphisms in diagnosis of diseases)

L8 ANSWER 11 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2002:974509 HCAPLUS

DOCUMENT NUMBER: 139:46323

TITLE: Cellular uptake, distribution, and stability of

10 - 23 deoxyribozymes

AUTHOR(S): Dass, Crispin R.; Saravolac, Edward G.; Li,

Yang; Sun, Lun-Quan

CORPORATE SOURCE: Johnson and Johnson Research Laboratories,

Eveleigh, 1430, Australia

SOURCE: Antisense & Nucleic Acid Drug Development

(2002), 12(5), 289-299

CODEN: ANADF5; ISSN: 1087-2906

PUBLISHER: Mary Ann Liebert, Inc.

DOCUMENT TYPE: Journal LANGUAGE: English

The cellular uptake, intracellular distribution, and stability of AB 33-mer deoxyribozyme oligonucleotides (DNAzymes) were examined in several cell lines. PAGE anal. revealed that there was a weak association between the DNAzyme and DOTAP or Superfect transfection reagents at charge ratios that were minimally toxic to cultured Cellular uptake was analyzed by cell fractionation of radiolabeled DNAzyme, by FACS, and by fluorescent microscopic anal. of FITC-labeled and TAMRA-labeled DNAzyme. Altering DNAzyme size and chemical did not significantly affect uptake into cells. Inspection of paraformaldehyde-fixed cells by fluorescence microscopy revealed that DNAzyme was distributed primarily in punctate structures surrounding the nucleus and that substantial delivery to the nucleus was not observed up to 24 h after initiation of transfection. Incubation in human serum or plasma demonstrated that a 3'-inversion modification greatly increased DNAzyme stability $(t1/2 \approx 22 \text{ h})$ in comparison to the unmodified form (t1/2 \approx 70 min). The 3'-inversion-modified DNAzymes remained stable during cellular uptake, and catalytically active oligonucleotide could be extracted from the cells 24 h posttransfection. In smooth muscle cell proliferation assay, the modified DNAzyme targeting the c-myc gene showed a much stronger inhibitory effect than did the unmodified version. The present study demonstrates that DNAzymes with a 3'-inversion are readily delivered into cultured cells and are functionally stable for several hours in serum and within cells.

IT 543745-67-1D, 5'-FITC labeled

RL: PAC (Pharmacological activity); PKT (Pharmacokinetics); THU
(Therapeutic use); BIOL (Biological study); USES (Uses)
 (cellular uptake, distribution, and stability of 10-23
 deoxyribozymes)

Searcher: Shears 571-272-2528

THERE ARE 34 CITED REFERENCES AVAILABLE 34 REFERENCE COUNT: FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L8 ANSWER 12 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2002:927617 HCAPLUS

DOCUMENT NUMBER:

138:19530

TITLE:

Nucleic acid treatment of diseases or conditions

related to levels of Ras, HER2 and HIV

INVENTOR(S):

McSwiggen, James

PATENT ASSIGNEE(S):

Ribozyme Pharmaceuticals, Incorporated, USA PCT Int. Appl., 185 pp.

SOURCE:

DOCUMENT TYPE:

CODEN: PIXXD2 Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

104

PATENT INFORMATION:

PA:	TENT	NO.		KI	ND	DATE			APPLICATION NO. DATE							
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PRIORITY APPLN. INFO.:
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                                         US 2002-277494
                                                           A1 20021021
                                         US 2003-440129P
                                                          P 20030115
     The present invention relates to nucleic acid mols., including
AB
     enzymic nucleic acid mols., such as DNAzymes (e.g. DNA enzymes,
     catalytic DNA), siRNA, aptamers, and antisense that modulate the
     expression of Ras genes such as K-Ras, H-Ras, and/or N-Ras, HIV
     genes such as HIV-1, and HER2 (c-erbB2) gene. The sequence of human
     HER2 or Ras genes were screened for accessible sites using a
     computer-folding algorithm. Regions of the RNA that do not form
     secondary folding structure and contain potential enzymic nucleic
     acid mol. and/or antisense binding/cleavage sites are identified.
     The sequences of c-Ki-ras, c-Ha-ras, HER2, and HIV RNA
     binding/cleavage sites are provided, as are the sequences of
     designed enzymic nucleic acid mols., e.g., hammerhead ribozymes,
     DNAzymes, inozymes, zinzymes, and Amberzymes. [This abstract record
     is one of two records for this document necessitated by the large
     number of index entries required to fully index the document and
     publication system constraints.].
     478129-01-0
ΙT
     RL: PRP (Properties)
        (unclaimed nucleotide sequence; nucleic acid treatment of
        diseases or conditions related to levels of Ras, HER2 and HIV)
     ANSWER 13 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN
                          2002:828621 HCAPLUS
ACCESSION NUMBER:
DOCUMENT NUMBER:
                          138:314544
                          Oligonucleotide-mediated inhibition of hepatitis
TITLE:
                          B virus and hepatitis C virus replication
                          Blatt, Lawrence; Macejak, Dennis; McSwiggen,
INVENTOR(S):
                          James; Morrissey, David; Pavco, Pamela; Lee,
                          Patrice; Draper, Kenneth; Roberts, Elisabeth
                          Ribozyme Pharmaceuticals, Inc., USA
PATENT ASSIGNEE(S):
                          PCT Int. Appl., 387 pp.
SOURCE:
                          CODEN: PIXXD2
DOCUMENT TYPE:
                          Patent
                          English
LANGUAGE:
FAMILY ACC. NUM. COUNT:
                          104
PATENT INFORMATION:
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Searcher : Shears 571-272-2528

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KIND DATE
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                                         US 2000-696347
                                                           A2 20001218
                                         US 2000-740332
AB
     The present invention relates to nucleic acid mols., including
     antisense and enzymic nucleic acid mols., such as hammerhead ribozymes, DNAzymes, Inozymes, Zinzymes, Amberzymes, and G-cleaver
     ribozymes, which modulate the synthesis, expression and/or stability
     of a hepatitis C virus (HCV) or hepatitis B virus (HBV) RNA and
     methods for their use alone or in combination with other therapies.
     In addition, nucleic acid decoy mols. and aptamers that bind to HBV
     reverse transcriptase and/or HBV reverse transcriptase primer
     sequences and methods for their use alone or in combination with
     other therapies, are disclosed. Oligonucleotides that specifically
     bind the Enhancer I region of HBV DNA are further disclosed. The
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Searcher: Shears 571-272-2528

present invention further relates to the use of nucleic acids, such

expression of HBV genes and HBV viral replication. Furthermore, HBV animal models and methods of use are disclosed, including methods of screening for compds. and/or potential therapies directed against HBV. The present invention also relates to compds., including

enzymic nucleic acid mols., ribozymes, DNAzymes, nuclease-activating

as decoy and aptamer mols. of the invention, to modulate the

compds. and chimeras such as 2',5'-adenylates, that modulate the expression and/or replication of HCV. [This abstract record is one of five records for this document necessitated by the large number of index entries required to fully index the document and publication system constraints.].

IT 491672-93-6

RL: PRP (Properties)

(unclaimed nucleotide sequence; oligonucleotide-mediated inhibition of hepatitis B virus and hepatitis C virus replication)

ANSWER 14 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN L8

ACCESSION NUMBER:

2002:822462 HCAPLUS

DOCUMENT NUMBER:

138:265678

TITLE:

Modulation of gene expression associated with

inflammation, proliferation and neurite

outgrowth using antisense and enzymic nucleic

acid-based technologies

INVENTOR(S):

Blatt, Lawrence; Chowrira, Bharat; Haeberli,

Peter; McSwiggen, James; Fosnaugh, Kathy

PATENT ASSIGNEE(S):

Ribozyme Pharmaceuticals, Incorporated, USA

SOURCE:

PCT Int. Appl., 317 pp. CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT: 12

PATENT INFORMATION: DD FFF 170

	PATENT NO.					KIND DATE				APPLICATION NO. DATE								
	WO	20020	20021017				WO 2002-XC10512 20020403											
		W:														BZ,		
			CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DI\	1, I	ΟŹ,	EC,	EE,	ES,	FI,	GB,	GD,
			GE,	GH,	GM,	HR,	HU,	ID,	IL,	I	١, ١	IS,	JP,	KE,	KG,	KP,	KR,	ΚŻ,
			LC,	LK,	LR,	LS,	LT,	LU,	LV,	M	A, 1	ΜD,	MG,	MK,	MN,	MW,	MX,	ΜZ,
			NO,	NZ,	OM,	PH,	PL,	PT,	RO,	RU	J, S	SD,	SE,	SG,	SI,	SK,	SL,	ТJ,
			TM,	TN,	TR,	TT,	ΤZ,	UA,	UG,	US	S, (JZ,	VN,	YU,	ZA,	ZM,	AM,	ΑZ,
			BY,	KG,	ΚZ,	MD,	RU,	ТJ,	TM									
		RW:														ZW,		
			CH,	CY,	DE,	DK,	ES,	FI,	FR,	GE	3, (GR,	ΙE,	ΙΤ,	LU,	MC,	NL,	PT,
			SE,	TR,	BF,	ВJ,	CF,	CG,	CI,	CN	1, (GΑ,	GN,	GQ,	GW,	ML,	MR,	NE,
			•	TD,														
		2003				_							2001					
		2003.		-		_	20030626				US 2002-156306 2002052							
		2003.				_	20030							24005		2002		
		2003.					2003							26992		2002		
		2003				L	2003	1009						30006		2002		
PRIOR	ITY	APPI	LN.	INFO	. :									95		2001		
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														L5P		2001		
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7 D							_ 1 _ 4 .									2001		

The present invention relates to nucleic acid mols., including AB antisense, enzymic nucleic acid mols., and RNA interference mols., which modulate the expression of genes encoding prostaglandin D2 receptor, adenosine receptor A1, NOGO receptor, IkB protein kinase, and protein kinase PKR. Thus, nucleic acids encoding these products are scanned to identify targets for cleavage by designed

> Shears 571-272-2528 Searcher :

enzymic nucleic acids, such as hammerhead ribozymes, Inozymes, Zinzymes, DNAzymes, and Amberzymes. Chemical modifications in the sugar, base, and/or phosphate backbones of these enzymic nucleic acids is carried out to improve their stability. Inhibition of gene product expression may be used for treatment of diseases associated with said expression. [This abstract record is one of four records for this document necessitated by the large number of index entries required to fully index the document and publication system constraints.].

IT 484802-52-0

RL: PRP (Properties)

(unclaimed nucleotide sequence; modulation of gene expression associated with inflammation, proliferation and neurite outgrowth using antisense and enzymic nucleic acid-based technologies)

L8 ANSWER 15 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2002:698624 HCAPLUS

DOCUMENT NUMBER:

138:66656

TITLE:

Nucleic acid-based treatment of diseases or conditions related to West Nile virus infection

INVENTOR(S):

Blatt, Lawrence; McSwiggen, James A. Ribozyme Pharmaceuticals, Inc., USA

PATENT ASSIGNEE(S):

PCT Int. Appl., 495 pp.

SOURCE:

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

LANGUAGE:
FAMILY ACC. NUM. COUNT:

r: 9

PATENT INFORMATION:

ATENT INFORMATION:

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DATE
     PATENT NO.
                       KIND
                              DATE
                                              APPLICATION NO.
                       ____
                              _____
                                              _____
     WO 2002068637
                       A2
                              20020906
                                            WO 2001-XH48350 20011019
         W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ,
              LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ,
              NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR,
              TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ,
             MD, RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH,
              CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE,
              TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN,
              TD, TG
                                             WO 2001-US48350 20011019
     WO 2002068637
                              20020906
                        Α2
                              20030515
     WO 2002068637
                        C1
             AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH,
              CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD,
              GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ,
              LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ,
             NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR,
             TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ,
             MD, RU, TJ, TM
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              CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE,
              TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN,
              TD, TG
PRIORITY APPLN. INFO.:
                                           US 2000-242411P P 20001020
                                           WO 2001-US48350 A 20011019
```

AB The present invention relates to nucleic acid mols. (e.g., ribozymes, DNAzymes, antisense oligonucleotides, triplex-forming oligonucleotides, 2-5A oligonucleotides, decoys) that modulate the expression and/or replication of West Nile Virus (WNV). Such enzymic and antisense nucleic acids can be used to diagnose and treat diseases associated with WNV infection, such as pancreatitis, encephalitis, myocarditis, meningitis, neurol. infection, hepatitis, liver failure, hepatocellular carcinoma, and cirrhosis. Thus, the sequence of human WNV was screened for accessible sites using a computer-folding algorithm; regions of the RNA that do not form secondary folding structures and contain potential enzymic nucleic acid and/or antisense binding/cleavage sites were identified. Enzymic nucleic acids mols. are designed that could bind each target and are individually analyzed by computer folding. Varying binding arm lengths can be chosen to optimize activity. Five different enzymic nucleic acid mols. of different motifs (hammerhead, inozyme, DNAzyme, Amberzyme, and zinzyme) show cleavage data with full-length or partially full-length, internally-labeled target RNA. enzymic nucleic acid mols. are effective against WNV RNA in vivo (HeLa cells) and in animal models (mice infected with WNV). abstract record is one of nine records for this document necessitated by the large number of index entries required to fully index the document and publication system constraints.].

IΤ 479786-61-3

AUTHOR(S):

RL: PRP (Properties)

(unclaimed nucleotide sequence; nucleic acid-based treatment of diseases or conditions related to West Nile virus infection)

ANSWER 16 OF 26 HCAPLUS COPYRIGHT 2004 ACS: on STN

2002:414955 HCAPLUS ACCESSION NUMBER:

DOCUMENT NUMBER:

137:121425

TITLE: A general strategy for effector-mediated control

> of RNA-cleaving ribozymes and DNA enzymes Wang, Dennis Y.; Lai, Beatrice H. Y.; Sen,

Dipankar

Department of Molecular Biology & Biochemistry, CORPORATE SOURCE:

Simon Fraser University, Burnaby, BC, V5A 1S6,

Can.

Journal of Molecular Biology (2002), 318(1), SOURCE:

33-43

CODEN: JMOBAK; ISSN: 0022-2836

PUBLISHER: Elsevier Science Ltd.

DOCUMENT TYPE: Journal LANGUAGE: English

A novel and general approach is described for generating versions of AΒ RNA-cleaving ribozymes (RNA enzymes) and DNAzymes (DNA enzymes), whose catalytic activity can be controlled by the binding of activator mols. Variants of the RNA-cleaving 10-23 DNAzyme and 8-17 DNAzyme were created, whose catalysis was activated by up to .apprx.35-fold by the binding of the effector adenosine. The design of such variants was possible even though the tertiary folding of the two DNAzymes is not known. Variants of the hammerhead ribozyme were constructed, to respond to the effectors ATP and FMN. in conventional allosteric ribozymes, effector-binding modulates the chemical step of catalysis, here, effectors exercise their effect upon the substrate-binding step, by stabilizing the enzyme-substrate complex. Because such an approach for controlling the activity of DNAzymes/ribozymes requires no prior knowledge of the enzyme's

> Shears 571-272-2528 Searcher :

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secondary or tertiary folding, this regulatory strategy should be
generally applicable to any RNA-cleaving ribozyme or DNAzyme,
natural or in vitro selected, provided substrate-recognition is
achieved by Watson-Crick base-pairing.
444035-98-7
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RL: BSU (Biological study, unclassified); CAT (Catalyst use); PRP (Properties); BIOL (Biological study); USES (Uses) (DNAzyme; design and properties of effector-mediated

aptamer-containing DNAzymes)

THERE ARE 51 CITED REFERENCES AVAILABLE REFERENCE COUNT: 51 FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANSWER 17 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN 18 2002:171921 HCAPLUS

ACCESSION NUMBER: DOCUMENT NUMBER:

136:241681

TITLE:

IT

Antisense oligonucleotides against vanilloid receptor 1 (VR1), therapeutic and diagnostic

uses, and screening method

Kurreck, Jens; Erdmann, Volker A. INVENTOR(S):

Grunenthal Gmbh, Germany PATENT ASSIGNEE(S): PCT Int. Appl., 76 pp. SOURCE: CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

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DATE ...
                      KIND
                                            APPLICATION NO.
                                                              DATE
     PATENT NO.
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                             _____
                                            _____
                                            WO 2001-EP10081 20010831
    WO 2002018407
                       A2
                             20020307
    WO 2002018407
                       A3
                             20021003
    WO 2002018407
                       C2
                             20030515
            AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH,
             CN, CO, CR, CU, CZ, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC,
             LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO,
             NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR,
             TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ,
             MD, RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH,
             CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE,
             TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN,
             TD, TG
                                            DE 2000-10043674 20000902
     DE 10043674
                             20020321
                       Α1
                                            DE 2000-10043702 20000904
    DE 10043702
                       Αl
                             20020314
    AU 2001095531
                       Α5
                             20020313
                                            AU 2001-95531
                                                              20010831
                             20030528
                                            EP 2001-976176
                                                              20010831
    EP 1313768
                       A2
            AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC,
             PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR
     US 2004002473
                            20040101
                                            US 2003-376341
                                                              20030303
                       A1
PRIORITY APPLN. INFO.:
                                         DE 2000-10043674 A 20000902
                                         DE 2000-10043702 A 20000904
                                         WO 2001-EP10081 W 20010831
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The invention provides antisense oligodeoxynucleotides against VR1, corresponding nucleotide constructs, cells containing the nucleotide constructs, pharmaceuticals and diagnostic substances, the use thereof in pain therapy, and methods for diagnosing symptoms related

> Shears 571-272-2528 Searcher :

to VR1 and identifying pain-modulating substances.

403777-66-2 IT

RL: PRP (Properties)

(Unclaimed; antisense oligonucleotides against vanilloid receptor 1 (VR1), therapeutic and diagnostic uses, and screening method)

ANSWER 18 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN L8

ACCESSION NUMBER:

2002:122738 HCAPLUS

DOCUMENT NUMBER:

136:194272

TITLE:

Ribozymes and antisense oligonucleotides for the

inhibition of gene expression by

calcium-activated chloride channel-1 gene CLCA-1

APPLICATION NO. DATE

Thompson, James; McSwiggen, James; McKenzie, Timothy; Ayers, David; Szymkowski, David E.; INVENTOR(S):

Grupe, Andrew

PATENT ASSIGNEE(S):

Ribozyme Pharmaceuticals, Incorporated, USA;

Syntex (U.S.A.) LLC

SOURCE:

PCT Int. Appl., 152 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

DATE

FAMILY ACC. NUM. COUNT: 1

PATENT NO. KIND

PATENT INFORMATION:

	WO 2002011674 WO 2002011674				A2 20020214 A3 20030925) 20	01-U	70	20010809			
	W: 2002	AE,	ĀG,	AL,	AM,	AT,	ΑU,	ΑZ,	BA,	BB,	BG,	BR,	BY,	ΒZ,	CA,	CH,
		CN,	co,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	ES,	FI,	GB,	GD,
		GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	KE,	KG,	KP,	KR,	KZ,
															MX,	
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US 2003064946 A1 20030403 US 2001-927046 20010809																
PRIORITY APPLN. INFO.: US 2000-224383P P 20000809																
AB Nucleic acid mols., including antisense and enzymic nucleic acid																
mols., such as hammerhead ribozymes, DNAzymes, and GeneBlocs, which																
modulate the expression of calcium-activated chloride channels																
(CLCA1, CLCA2, CLCA3, and CLCA4) are provided. A target discovery																
target validation approach was used for finding genes that are																
involved in chronic mucous hypersecretion. The reporter system													aono			
consists of a plasmid construct, termed pMUC5AC-EGFP, bearing a gene coding for green fluorescent protein (GFP). The promoter region of													gene			
	the GFP	ror g	reer	1 TT	loce	a b	c pr	ovei	11 (G)	E	1111	e pr	SNC SNC	CT T	59101	.1 01
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Searcher : Shears 571-272-2528

DNAzyme, NCH, amberzyme, zinzyme, and G-Cleaver ribosome binding/cleavage sites in CLCAl were identified. The nucleic acid mols. are individually analyzed by computer folding to assess whether the sequences fold into the appropriate secondary structure and to anneal to various sites in the RNA target. Those nucleic acid mols. with unfavorable intramol. interactions such as between the binding arms and the catalytic core are eliminated from consideration. Varying binding arm lengths can be chosen to optimize activity.

IT 400185-65-1

RL: PRP (Properties)

(unclaimed nucleotide sequence; ribozymes and antisense oligonucleotides for the inhibition of gene expression by calcium-activated chloride channel-1 gene CLCA-1)

L8 ANSWER 19 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2001:582042 HCAPLUS

DOCUMENT NUMBER:

135:175355

TITLE:

Nucleic acid reagents for inhibition of checkpoint kinase-1 gene expression for

therapeutic use

INVENTOR(S):

Fattaey, Ali R.; Jarvis, Thale; McSwiggen, James; Booher, Robert N.; Holman, Patricia S.

PATENT ASSIGNEE(S):

Ribozyme Pharmaceuticals, Inc., USA

SOURCE:

PCT Int. Appl., 115 pp.

SOURCE:

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT: 1

study); USES (Uses)

PATENT INFORMATION:

	PATENT NO.				ND	DATE			A.	PPLI	CATI	DATE				
				20010809 20020829			WO 2001-US3504						20010202			
	₩:	AE, CN, GM, LR, PL,	AG, CR, HR, LS, PT, UG,	AL, CU, HU, LT, RO,	AM, CZ, ID, LU, RU,	AT, DE, IL, LV, SD,	AU, DK, IN, MA, SE,	DM, IS, MD, SG,	DZ, JP, MG, SI,	EE, KE, MK, SK,	ES, KG, MN, SL,	FI, KP, MW, TJ,	GB, KR, MX, TM,	BZ, GD, KZ, MZ, TR, KZ,	GE, LC, NO, TT,	GH, LK, NZ, TZ,
	RW:	GH, CY,	GM, DE,	DK,	ES,	FI,	FR,	GB,	GR,	IE,	IT,	LU,	MC,	AT, NL, NE,	PT,	SE,
US 2003087847 A1 20030508 US 2001-776474 20010202 PRIORITY APPLN. INFO.: US 2000-179983P P 20000203																
AB The present invention relates to nucleic acid mols., including antisense and enzymic nucleic acid mols., such as hammerhead ribozymes, DNAzymes, and antisense, which modulate the expression of the Chk-1 gene. Inhibition of the enzyme may be useful in the treatment of a number of cancers including lung, breast, prostate and colorectal cancer.																
ΙT	190795- RL: PRP	31-4); T	HU ('	Ther	apeu	tic	use)	; BI	OL (Biol	ogic	al	

Searcher: Shears 571-272-2528

(nucleotide sequence, antisense DNA inhibiting checkpoint kinase

gene expression; nucleic acid reagents for inhibition of checkpoint kinase-1 gene expression for therapeutic use)

ANSWER 20 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN L8

ACCESSION NUMBER:

CORPORATE SOURCE:

2001:186701 HCAPLUS

DOCUMENT NUMBER:

135:57661

TITLE:

Characterization in terms of the NUX rule of G-inserted mutant hammerhead ribozymes with high

level of catalytic power

AUTHOR(S):

Kuwabara, Tomoko; Warashina, Masaki; Kato, Yoshio; Kawasaki, Hiroaki; Taira, Kazunari Gene Discovery Research Center, National Institute of Advanced Industrial Science and

Technology (AIST), Tsukuba Science City,

305-8562, Japan

SOURCE:

Journal of Biochemistry and Molecular Biology

(2001), 34(1), 51-58 CODEN: JBMBE5; ISSN: 1225-8687 Springer-Verlag Singapore Pte. Ltd.

PUBLISHER: DOCUMENT TYPE:

Journal

LANGUAGE: English

Attempts using in vitro and in vivo selection procedures have been made to search for hammerhead ribozymes that have higher activities than the wild-type ribozyme and also to determine whether other sequences might be possible in the catalytic core of the hammerhead ribozyme. Active sequences selected in the past conformed broadly to the consensus core sequence except at A9, and no sequences were associated with higher activity than that of the hammerhead with the consensus core, an indication that the consensus sequence derived from viruses and virusoids is probably the optimal sequence. Recently, during construction of ribozyme expression vectors, we isolated a mutant hammerhead ribozyme, with an insertion of G between A9 and G10.1, that appeared to show significant activity. We, therefore, characterized kinetic properties of the G-inserted mutant ribozymes in terms of the NUX rule. We demonstrate that the NUX rule is basically applicable to the G-inserted ribozymes and, more importantly, one type of G-inserted ribozyme was very active with kcat value of 6.4 min-1 in 50 mM Tris-HCl (pH 8.0) and 10 mM MgCl2 at 37°C.

IT 345373-30-0 345373-31-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); PRP (Properties); BIOL (Biological

(characterization in terms of the NUX rule of G-inserted mutant hammerhead ribozymes with high level of catalytic power)

REFERENCE COUNT:

THERE ARE 91 CITED REFERENCES AVAILABLE

FOR THIS RECORD. ALL CITATIONS AVAILABLE

IN THE RE FORMAT

ANSWER 21 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2001:48059 HCAPLUS

DOCUMENT NUMBER:

134:291623

TITLE:

In vitro-selected RNA cleaving DNA enzymes from a combinatorial library are potent inhibitors of

HIV-1 gene expression

AUTHOR(S):

Sriram, Bandi; Banerjea, Akhil C.

CORPORATE SOURCE:

Laboratory of Virology, National Institute of

Immunology, New Delhi, 110067, India

Searcher : Shears 571-272-2528

SOURCE: Biochemical Journal (2000), 352(3), 667-673

CODEN: BIJOAK; ISSN: 0264-6021

PUBLISHER: Portland Press Ltd.

DOCUMENT TYPE: Journal LANGUAGE: English

Selective inactivation of a target gene by antisense mechanisms is AB an important biol. tool to delineate specific functions of the gene product. Approaches mediated by ribozymes and RNA-cleaving DNA enzymes (DNA enzymes) are more attractive because of their ability to catalytically cleave the target RNA. DNA enzymes have recently gained a lot of importance because they are short DNA mols. with simple structures that are expected to be stable to the nucleases present inside a mammalian cell. The authors have designed a strategy to identify accessible cleavage sites in HIV-1 gag RNA from a pool of random DNA enzymes, and for isolation of DNA enzymes. A pool of random sequences (all 29 nucleotides long) that contained the earlier-identified 10-23 catalytic motif were tested for their ability to cleave the target RNA. When the pool of random DNA enzymes was targeted to cleave between any A and U nucleotides, DNA enzyme 1836 was identified. Although several DNA enzymes were identified using a pool of DNA enzymes that was completely randomized with respect to its substrate-binding properties, DNA enzyme-1810 was selected for further characterization. Both DNA enzymes showed target-specific cleavage activities in the presence of Mg2+ only. When introduced into a mammalian cell, they showed interference with HIV-1-specific gene expression. This strategy could be applied for the selection of desired target sites in any target RNA.

IT 334544-13-7 334544-14-8

RL: BAC (Biological activity or effector, except adverse); BPR (Biological process); BSU (Biological study, unclassified); BIOL (Biological study); PROC (Process)

(RNA-cleaving DNAzymes from combinatorial library are potent inhibitors of HIV-1 gene expression)

REFERENCE COUNT:

THERE ARE 12 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L8 ANSWER 22 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

12

ACCESSION NUMBER:

2000:725799 HCAPLUS

DOCUMENT NUMBER:

133:291920

TITLE:

Method for identifying antisense DNA-,

ribozyme-, or DNAzyme-accessible binding sites

on RNA

INVENTOR(S):

Rossi, John; Riggs, Arthur; Scherr, Michaela

City of Hope, USA

PATENT ASSIGNEE(S): SOURCE:

PCT Int. Appl., 38 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO. KIND DATE APPLICATION NO. DATE
WO 2000060115 A2 20001012 WO 2000-US7920 20000327

WO 2000060115 A3 20010426

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN,

Searcher: Shears 571-272-2528

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CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT,
              RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG,
         UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF,
              BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG
                                                                 20000328
                                               US 2000-536393
     US 6562570
                         В1
                              20030513
                                               US 2003-435044
     US 2003228615
                         A1
                              20031211
                                                                 20030512
                                           US 1999-127529P P 19990402
PRIORITY APPLN. INFO.:
                                           US 2000-536393
                                                              A1 20000328
     A method for identifying sites on a target RNA which are accessible
     to pairing by antisense DNA, ribozymes or DNAzymes. Native or in
     vitro -synthesized target RNA is incubated with defined ODNs and
     RNase H, or with a random or semi-random ODN library and RNase H, or
     with defined ribozymes or DNAzymes, or with a semi-random ribozyme
     or DNAzyme library, in a cell extract containing endogenous RNA binding
     proteins, or in a medium which mimics a cell extract due to presence of
     one or more RNA-binding proteins. Any antisense ODN, ribozyme or
     DNAzyme which is complementary to an accessible site in the target
     RNA hybridizes to that site and the RNA is cleaved at that site.
     Reverse transcription can be used to generate a first strand DNA
     from the RNA cleavage product, and terminal deoxynucleotidyl
     transferase-dependent polymerase chain reaction (TDPCR) can be used
     to identify sites on target RNA to which antisense ODNs, ribozymes
     or DNAzymes have bound and cleavage has occurred. The method was
     applied to identification of hammerhead ribozyme cleavage sites on
     human gene AIB1 mRNA as well as murine DNA methyltransferase mRNA.
     300756-64-3 300756-65-4
ΙT
     RL: PRP (Properties)
         (unclaimed nucleotide sequence; method for identifying antisense
        DNA-, ribozyme-, or DNAzyme-accessible binding sites on RNA)
     ANSWER 23 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN
                           2000:413290 HCAPLUS
ACCESSION NUMBER:
DOCUMENT NUMBER:
                           133:234043
                           Alternative Conformations of a Nucleic Acid
TITLE:
                           Four-way Junction
                           Nowakowski, Jacek; Shim, Peter J.; Stout, C.
AUTHOR(S):
                           David; Joyce, Gerald F.
                           Department of Chemistry, Skaggs Institute for
CORPORATE SOURCE:
                           Chemical Biology, Scripps Research Institute, La
                           Jolla, CA, 92037, USA
                           Journal of Molecular Biology (2000), 300(1),
SOURCE:
                           93-102
                           CODEN: JMOBAK; ISSN: 0022-2836
                           Academic Press
PUBLISHER:
DOCUMENT TYPE:
                           Journal
                           English
LANGUAGE:
     A crystal structure of a 108 nucleotide RNA-DNA complex containing a
     four-way junction was solved at 3.1 Å resolution The structure of
     the junction differs substantially from the "stacked-X" conformation
     observed previously, due to a 135° rotation of the branches.
     Comparison of the two conformers provides insight into the factors
     contributing to the flexibility of four-way junctions. The
     stacked-X conformation maximizes base-stacking but causes
     unfavorable repulsion between phosphate groups, whereas the 135
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Searcher: Shears 571-272-2528

"-rotated "crossed" conformation minimizes electrostatic clashes at the expense of reduced base-stacking. Despite the large rotation of the branches, both junction structures exhibit an antiparallel arrangement of the continuous strands and opposite polarity of the crossover strands. (c) 2000 Academic Press. 292890-11-0

RL: BSU (Biological study, unclassified); PRP (Properties); BIOL (Biological study)

(four-chain RNA-DNA complex; alternative conformations of a

nucleic acid four-way junction)

THERE ARE 29 CITED REFERENCES AVAILABLE REFERENCE COUNT: 29

FOR THIS RECORD. ALL CITATIONS AVAILABLE

IN THE RE FORMAT

ANSWER 24 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN L8

1999:124703 HCAPLUS ACCESSION NUMBER:

DOCUMENT NUMBER: 130:321986

Crystal structure of an 82-nucleotide RNA-DNA TITLE:

complex formed by the 10-23 DNA enzyme

Nowakowski, Jacek; Shim, Peter J.; Prasad, G. Sridhar; Stout, C. David; Joyce, Gerald F. AUTHOR(S):

Department of Chemistry and The Skaggs Institute CORPORATE SOURCE:

for Chemical Biology, The Scripps Research

Institute, La Jolla, CA, 92037, USA

Nature Structural Biology (1999), 6(2), 151-156 SOURCE:

CODEN: NSBIEW; ISSN: 1072-8368

Nature America PUBLISHER:

DOCUMENT TYPE: Journal LANGUAGE: English

The structure of a large nucleic acid complex formed by the 10-23 DNA enzyme bound to an RNA substrate was determined by x-ray diffraction at 3.0 Å resolution The 82-nucleotide complex contains two strands of DNA and two strands of RNA that form five double-helical domains. The spatial arrangement of these helixes is maintained by two four-way junctions that exhibit extensive base-stacking interactions and sharp turns of the phosphodiester backbone stabilized by metal ions coordinated to nucleotides at these junctions. Although it is unlikely that the structure corresponds to the catalytically active conformation of the enzyme, it represents a novel nucleic acid fold with implications for the Holliday junction structure.

223694-53-9 ΙT

ΙT

RL: PRP (Properties)

(crystal structure of 82-nucleotide RNA-DNA complex formed by 10-23 DNA enzyme)

REFERENCE COUNT:

30 THERE ARE 30 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

ANSWER 25 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN

1998:728600 HCAPLUS ACCESSION NUMBER:

DOCUMENT NUMBER: 130:1776

TITLE: Design and catalytic activity of enzymic DNA

molecules

Joyce, Gerald F.; Breaker, Ronald R. INVENTOR(S): The Scripps Research Institute, USA PATENT ASSIGNEE(S):

PCT Int. Appl., 161 pp. SOURCE:

CODEN: PIXXD2

DOCUMENT TYPE: Patent

> 571-272-2528 Searcher : Shears

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

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KIND
                                    DATE
                                                       APPLICATION NO.
                                                                             DATE
      PATENT NO.
                            ____
                                    -----
                                                       _____
                                                WO 1998-US8677
                           A1
                                    19981105
                                                                             19980429
      WO 9849346
           W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, GM, GW, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
           RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK,
                ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF,
                CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG
                            Al 19981124
      AU 9872675
                                                      AU 1998-72675
                                                                             19980429
                                    20010712
      AU 735522
                             B2
                             A1
                                   20000301
                                                      EP 1998-920015
                                                                             19980429
      EP 981646
               AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC,
                PT, IE, SI, LT, LV, FI, RO
                                    20000613
                                                       BR 1998-9433
                                                                             19980429
      BR 9809433
                             Α
                                                       JP 1998-547359
      JP 2002514080
                             Т2
                                    20020514
                                                                             19980429
                                                       AU 1999-65509
                                    20020207
                                                                             19991224
      AU 743767
                             B2
                                    20000309
      AU 9965509
                             A1
                                                   US 1997-45228P
PRIORITY APPLN. INFO.:
                                                                         P 19970429
                                                                         W 19980429
                                                   WO 1998-US8677
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The present invention discloses DNA enzymes -- catalytic or enzymic AB DNA mols. -- capable of cleaving nucleic acid sequences or mols., particularly RNA, in a site-specific manner, as well as compns. including same. The catalytic DNAs have first and substrate binding regions flanks a core region, wherein the first substrate binding region has a sequence complementary to a first portion of the preselected substrate nucleic acid sequence, and the second substrate binding region has a sequence complementary to a second portion of the preselected substrate nucleic acid sequence. The core region has a sequence according to the formula T(stem)'AGC(stem)"Z, where the (stem)' and (stem)" are each 3 sequential nucleotides which when hybridized as a (stem)':(stem)" pair comprise 3 base pairs including at least two G:C pairs and wherein Z = WCGR or \overline{WCGAA} , and $W = \overline{A}$ or T and R = A or G. Also contemplated is a core region having a sequence RGGCTAGCXACAACGA, wherein X = T, C or A, and R = A or G. Methods of making and using the disclosed enzymes and compns. are also disclosed. An exemplary method of engineering enzymic DNA mols. that cleave phosphoester bonds comprises the following in vitro selection/evolution steps: (1) obtaining a population of single-stranded DNA mols.; (2) introducing genetic variation into the population to produce a variant population; (3) selecting individuals from the variant population that meet predetd. selection criteria; (4) separating the selected individuals from the remainder of the variant population; and (5) amplifying the selected individuals. Deoxyribozymes variants designated 8-17 (core region 5'cttccaccttccgagccggacgaagttacttttt-3') and 10-23 (core region 5'-ctttggttaggctagctacaacgatttttcc-3') have turnover nos. and kobs of 0.5 and 1 h-1, 0.002 and 0.01 min-1, resp., in 10 mM Mg2+, pH 7.5 and 37°.

IT 215727-35-8P, Deoxyribozyme (synthetic clone 10-38)

Searcher: Shears 571-272-2528

RL: BAC (Biological activity or effector, except adverse); BPN (Biosynthetic preparation); BSU (Biological study, unclassified); PRP (Properties); BIOL (Biological study); PREP (Preparation)

(design and catalytic activity of enzymic DNA mols.)

REFERENCE COUNT: THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN

THE RE FORMAT

ANSWER 26 OF 26 HCAPLUS COPYRIGHT 2004 ACS on STN 1.8

ACCESSION NUMBER: 1997:308152 HCAPLUS

DOCUMENT NUMBER: 127:30832

TITLE: A general purpose RNA-cleaving DNA enzyme

AUTHOR(S): Santoro, Stephen W.; Joyce, Gerald F.

CORPORATE SOURCE: Departments of Chemistry and Molecular Biology

and the Skaggs Institute for Chemical Biology, The Scripps Research Institute, La Jolla, CA,

92037, USA

SOURCE: Proceedings of the National Academy of Sciences

of the United States of America (1997), 94(9),

4262-4266

CODEN: PNASA6; ISSN: 0027-8424 National Academy of Sciences

DOCUMENT TYPE:

Journal LANGUAGE: English

An in vitro selection procedure was used to develop a DNA enzyme that can be made to cleave almost any targeted RNA substrate under simulated physiol. conditions. The enzyme is comprised of a catalytic domain of 15 deoxynucleotides, flanked by two substrate-recognition domains of seven to eight deoxynucleotides each. The RNA substrate is bound through Watson-Crick base pairing and is cleaved at a particular phosphodiester located between an unpaired purine and a paired pyridine residue. Despite its small size, the DNA enzyme has a catalytic efficiency (Kcat/Km) of ≈109 M-1/min-1 under multiple turnover conditions, exceeding that of any other known nucleic acid enzyme. Its activity is dependent on the presence of Mg2+ ion. By changing the sequence of the substrate-recognition domains, the DNA enzyme can be made to target different RNA substrates. In this study, for example, it was directed to cleave synthetic RNAs corresponding to the start codon region of HIV-1 gag/pol, env, vpr, tat, and nef mRNAs.

IT190795-31-4

PUBLISHER:

RL: BAC (Biological activity or effector, except adverse); BPR (Biological process); BSU (Biological study, unclassified); RCT (Reactant); BIOL (Biological study); PROC (Process); RACT (Reactant or reagent)

(general purpose RNA-cleaving DNA enzyme)

E1 THROUGH E28 ASSIGNED

FILE 'REGISTRY' ENTERED AT 12:41:44 ON 21 JAN 2004 L9 28 SEA FILE=REGISTRY ABB=ON PLU=ON (190795-31-4/BI OR 215727-35-8/BI OR 223694-53-9/BI OR 292890-11-0/BI OR 300756-64-3/BI OR 300756-65-4/BI OR 334544-13-7/BI OR 334544-14-8/BI OR 345373-30-0/BI OR 345373-31-1/BI OR 400185-65-1/BI OR 403777-66-2/BI OR 444035-98-7/BI OR 478129-01-0/BI OR 479786-61-3/BI OR 483392-16-1/BI OR 484802-52-0/BI OR 491672-93-6/BI OR 493068-33-0/BI OR 503875-66-9/BI OR 504513-55-7/BI OR 506617-43-2/BI OR

> Searcher : Shears 571-272-2528

543745-67-1/BI OR 557143-59-6/BI OR 591261-44-8/BI OR 613321-58-7/BI OR 633370-08-8/BI OR 638223-95-7/BI)

L10 28 S L9 AND L1

L10 ANSWER 1 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

RN **638223-95-7** REGISTRY

CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME)

CI MAN

SOL 16

SEQ 1 rggctagcta caacga

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

L10 ANSWER 2 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

RN **633370-08-8** REGISTRY

CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 12: PN: US20030228590 SEQID: 14 unclaimed DNA

CI MAN

SQL 16

SEQ 1 rggctagcta caacga

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1: 140:26917

L10 ANSWER 3 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

RN **613321-58-7** REGISTRY

CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-C-G-A) (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2617: PN: US20030203870 SEQID: 2617 unclaimed DNA

CI MAN

SQL 16

SEQ 1 rggctagcta caacga

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1: 139:317479

L10 ANSWER 4 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

RN **591261-44-8** REGISTRY

CN DNA, d(N-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 63: PN: US2003171311 SEQID: 9700 unclaimed DNA

CI MAN

SQL 16

Searcher: Shears 571-272-2528

1 nggctagcta caacga SEO -----HITS AT: 1-16 REFERENCE 1: 139:224402 L10 ANSWER 5 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN **557143-59-6** REGISTRY RN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) OTHER NAMES: 1913: PN: US20030125270 FIGURE: 5 unclaimed DNA CN MANCI SQL 16 SEQ 1 rggctagcta caacga ---------HITS AT: 1-16 **RELATED SEQUENCES AVAILABLE WITH SEQLINK** REFERENCE 1: 139:358722 L10 ANSWER 6 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN RN **543745-67-1** REGISTRY DNA, $d(A-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-(3'\rightarrow3')-G)$ (9CI) (CA CN INDEX NAME) CI MAN SOL 17 SEQ 1 aggctagcta caacgag _____ 1-16 HITS AT: REFERENCE 1: 139:46323 L10 ANSWER 7 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN 506617-43-2 REGISTRY RN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) CN OTHER NAMES: 4771: PN: US20030073207 SEQID: 9645 unclaimed DNA CN CI MAN SOL 16 1 rggctagcta caacga ======== HITS AT: 1-16 **RELATED SEQUENCES AVAILABLE WITH SEQLINK** REFERENCE 1: 139:143909 L10 ANSWER 8 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN **504513-55-7** REGISTRY RN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) OTHER NAMES:

Searcher: Shears 571-272-2528

21: PN: US20030065155 SEQID: 21 unclaimed DNA

CN

SQL

MAN

16

SEQ 1 rggctagcta caacga

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1: 138:282290

L10 ANSWER 9 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

RN **503875-66-9** REGISTRY

CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 445: PN: US20030064945 SEQID: 445 claimed DNA

CI MAN

SQL 16

SEQ 1 rggctagcta caacga

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1: 138:292713

L10 ANSWER 10 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

RN **493068-33-0** REGISTRY

CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 13: PN: WOO3008628 SEQID: 13 unclaimed DNA

CI MAN

SOL 16

SEQ 1 rggctagcta caacga

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1: 138:142441

L10 ANSWER 11 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

RN 491672-93-6 REGISTRY

CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1774: PN: WO02081494 SEQID: 16197 unclaimed DNA

CI MAN

SQL 16

SEQ 1 rggctagcta caacga

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1: 138:314544

L10 ANSWER 12 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN

Searcher: Shears 571-272-2528

09/423035 **484802-52-0** REGISTRY RN CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) OTHER NAMES: 80: PN: WO02081628 SEQID: 13274 unclaimed DNA CN CI MAN SQL 16 SEQ 1 rggctagcta caacga _____ HITS AT: 1-16 **RELATED SEQUENCES AVAILABLE WITH SEQLINK** REFERENCE 1: 138:265678 L10 ANSWER 13 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN **483392-16-1** REGISTRY RN CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) OTHER NAMES: 21: PN: US20030008295 SEQID: 21 unclaimed DNA CN CI MAN SQL 16 SEQ 1 rggctagcta caacga _____ HITS AT: 1-16 **RELATED SEQUENCES AVAILABLE WITH SEQLINK**

REFERENCE 1: 138:84437

L10 ANSWER 14 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN RN **479786-61-3** REGISTRY DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) CN OTHER NAMES: 2122: PN: WO02068637 SEQID: 37054 unclaimed RNA CN CI MAN SOL 16

1 rggctagcta caacqa SEQ -----

HITS AT: 1-16

RELATED SEQUENCES AVAILABLE WITH SEQLINK

REFERENCE 1: 138:66656

L10 ANSWER 15 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN RN 478129-01-0 REGISTRY DNA, d(Y-R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-R) (9CI) (CA INDEX NAME) CN OTHER NAMES: 1332: PN: WO02097114 SEQID: 6810 unclaimed RNA CN CI MAN SQL 18

SEO 1 yrggctagct acaacgar ________

HITS AT: 2-17

> Searcher : Shears 571-272-2528

REFERENCE 1: 138:19530 L10 ANSWER 16 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN **444035-98-7** REGISTRY RN DNA, d(G-A-G-C-T-G-G-A-G-G-A-A-A-C-G-G-C-A-G-T-C), complex with DNA CN A-A-G-C-T-C) and RNA (G-A-C-U-G-C-C-G-U-A-G-G-U-U-G-C-C-C) (1:1:1) (9CI) (CA INDEX NAME) CI MAN SQL 78,39,21,18 SEO 1 gggcaaggct agctacaacg actaaattgg aggaagctc ____ _ ___ _ _ _ _ HITS AT: 6-21 SEQ 1 gagctggagg aaacggcagt c SEQ 1 gacugeegua gguugeee 1: 137:121425 REFERENCE L10 ANSWER 17 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN RN **403777-66-2** REGISTRY CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) CI MAN SQL 16 SEO 1 rggctagcta caacga HITS AT: 1-16 **RELATED SEQUENCES AVAILABLE WITH SEQLINK** 1: 136:241681 REFERENCE L10 ANSWER 18 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN **400185-65-1** REGISTRY RN CN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) OTHER NAMES: 449: PN: WO0211674 SEQID: 5447 unclaimed DNA CN CI MAN SQL 16 SEO 1 rggctagcta caacga _____ HITS AT: 1-16 **RELATED SEQUENCES AVAILABLE WITH SEQLINK** REFERENCE 1: 136:194272 L10 ANSWER 19 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN **345373-31-1** REGISTRY RN DNA, d(A-T-C-T-T-G-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-A-C-C-A-T-G), CN complex with RNA (C-A-U-G-G-U-A-C-A-A-G-A-U) (1:1) (9CI) (CA INDEX NAME) OTHER CA INDEX NAMES:

Searcher :

Shears

571~272-2528

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RNA, (C-A-U-G-G-U-A-C-A-A-G-A-U), complex with DNA
CN
      d(A-T-C-T-T-G-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-A-C-C-A-T-G) \quad (1:1) \quad (9CI)
      MAN
CI
SQL
     40,27,13
SEO
           1 atcttgggct agctacaacg aaccatg
                     ____ =
HITS AT:
              6-21
           1 caugguacaa gau
SEO
REFERENCE
               1: 135:57661
L10 ANSWER 20 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN
      345373-30-0 REGISTRY
RN
      \texttt{DNA,} \quad \texttt{d} \left( \texttt{C-G-G-A-G-A-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-A-C-A-A-G-C} \right) \,,
CN
      complex with RNA (G-C-U-U-G-U-A-U-C-U-C-G) (1:1) (9CI) (CA INDEX
      NAME)
OTHER CA INDEX NAMES:
      RNA, (G-C-U-U-G-U-A-U-C-U-C-C-G), complex with DNA
      d(C-G-G-A-G-A-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-A-C-A-A-G-C) \quad (1:1) \quad (9CI)
CI
      MAN
SOL
      40,27,13
SEO
           1 cggagaggct agctacaacg aacaagc
                     ____ =
HITS AT:
              6-21
           1 gcuuguaucu ccg
SEQ
REFERENCE
               1: 135:57661
L10 ANSWER 21 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN
RN
      334544-14-8 REGISTRY
      \texttt{DNA, } \texttt{d} \left( \texttt{A} - \texttt{G} - \texttt{T} - \texttt{G} - \texttt{T} - \texttt{C} - \texttt{G} - \texttt{G} - \texttt{C} - \texttt{T} - \texttt{A} - \texttt{G} - \texttt{C} - \texttt{T} - \texttt{A} - \texttt{C} - \texttt{A} - \texttt{A} - \texttt{C} - \texttt{G} - \texttt{A} - \texttt{T} - \texttt{C} - \texttt{C} - \texttt{T} - \texttt{G} - \texttt{G} - \texttt{T} \right),
      complex with RNA (A-C-C-A-G-G-A-G-C-G-A-C-A-C-U) (1:1) (9CI) (CA
      INDEX NAME)
OTHER CA INDEX NAMES:
      RNA, (A-C-C-A-G-G-A-G-C-G-A-C-A-C-U), complex with DNA
      d(A-G-T-G-T-C-G-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-T-C-C-T-G-G-T) \quad (1:1)
      (9CI)
CI
      MAN
SQL
     44,29,15
SEQ
           1 agtgtcgggc tagctacaac gatcctggt
                     ---- -------- ==
HITS AT:
              7-22
SEQ
           1 accaggagcg acacu
REFERENCE
               1: 134:291623
L10 ANSWER 22 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN
      334544-13-7 REGISTRY
RN
      \texttt{DNA, d}(\texttt{C-C-T-G-A-C-A-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-G-C-T-G-T-C-A}),
CN
      complex with RNA (U-G-A-C-A-G-C-A-U-G-U-C-A-G-G) (1:1) (9CI) (CA
      INDEX NAME)
OTHER CA INDEX NAMES:
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Searcher: Shears 571-272-2528

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RNA, (U-G-A-C-A-G-C-A-U-G-U-C-A-G-G), complex with DNA
CN
    d(C-C-T-G-A-C-A-G-G-C-T-A-G-C-T-A-C-A-C-G-A-G-C-T-G-T-C-A) \quad (1:1)
    (9CI)
CI
    MAN
SQL 44,29,15
       1 cctgacaggc tagctacaac gagctgtca
               7-22
HITS AT:
       1 ugacagcaug ucagg
          1: 134:291623
REFERENCE
L10 ANSWER 23 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN
    300756-65-4 REGISTRY
    14: PN: WO0060115 SEQID: 20 unclaimed DNA (9CI) (CA INDEX NAME)
CN
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SQL
   16
SEO
       1 gggctagcta caacga
         _____
HITS AT:
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**RELATED SEQUENCES AVAILABLE WITH SEQLINK**
REFERENCE
          1: 133:291920
L10 ANSWER 24 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN
    300756-64-3 REGISTRY
RN
    13: PN: WO0060115 SEQID: 19 unclaimed DNA (9CI) (CA INDEX NAME)
CN
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    MAN
SQL 16
SEQ
       1 aggctagcta caacga ·
         HITS AT:
         1-16
**RELATED SEQUENCES AVAILABLE WITH SEQLINK**
REFERENCE
        1: 133:291920
L10 ANSWER 25 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN
    292890-11-0 REGISTRY
RN
    CN
    C-C-T), complex with RNA (A-G-G-A-G-A-G-A-G-A-U-G-G-G-U-G-C-G-A-G)
    (1:1) (9CI)
               (CA INDEX NAME)
OTHER CA INDEX NAMES:
    RNA, (A-G-G-A-G-A-G-A-G-A-U-G-G-G-U-G-C-G-A-G), complex with DNA
    T) (1:1) (9CI)
OTHER NAMES:
    DNA (synthetic DNA-RNA four-way junction)
    DNA (synthetic DNA-RNA Holliday junction)
CN
CI
    MAN
SQL 54,34,20
       1 ctcgcaccca ggctagctac aacgactctc tcct
SEQ
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Searcher: Shears 571-272-2528

_ _____ HITS AT: 10-25 1 aggagagaga ugggugcgag SEO REFERENCE 1: 133:234043 L10 ANSWER 26 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN 223694-53-9 REGISTRY RN ${\tt DNA, \ d\,(G-C-T-C-C-A-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-C-T-G-T-C-C)}\;,$ CN complex with RNA (G-G-A-C-A-G-A-U-G-G-G-A-G) (1:1) (9CI) (CA INDEX NAME) OTHER CA INDEX NAMES: RNA, (G-G-A-C-A-G-A-U-G-G-G-A-G), complex with DNA $d\left(G-C-T-C-C-C-A-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A-C-T-G-T-C-C\right) \quad (1:1)$ CI MAN SQL 82,28,28,13,13 SEO 1 gctcccaggc tagctacaac gactgtcc HITS AT: 7-22 1 gctcccaggc tagctacaac gactgtcc SEO ____ === HITS AT: 7-22 1 ggacagaugg gag SEO SEQ 1 ggacagaugg gag REFERENCE 1: 130:321986 L10 ANSWER 27 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN RN 215727-35-8 REGISTRY Deoxyribozyme (synthetic clone 10-38) (9CI) (CA INDEX NAME) CN MAN CI SQL 16 1 rggctagcha caacga SEQ ______ HITS AT: 1-16 **RELATED SEQUENCES AVAILABLE WITH SEQLINK** REFERENCE 1: 130:1776 L10 ANSWER 28 OF 28 REGISTRY COPYRIGHT 2004 ACS on STN 190795-31-4 REGISTRY RN DNA, d(R-G-G-C-T-A-G-C-T-A-C-A-A-C-G-A) (9CI) (CA INDEX NAME) CN CI MAN SQL 16 1 rggctagcta caacga

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RELATED SEQUENCES AVAILABLE WITH SEQLINK

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REFERENCE 1: 135:175355

REFERENCE 2: 127:30832

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TheoDroma cacao cDNA clone Cac_BL_5432 5', mRNA sequence.
CA798147
CA798147.1 GI:26055233
                                                               Gene
                                                                       Theobroma cacao Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids; eurosids II; Malvales; Malvaceae; Byttnerioideae; Theobroma.

1 (bases 1 to 80)
Jones, P.G., Allaway, D., Gilmour, D.M., Harris, C., Rankin, D., Retzel, E.R. and Jones, C.A.
Planta 216 (2),
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Masterfoods
3d Dundee Road, Slough, Berkshir
Tel: +44 1664 416644
Email: Paul.Jones@eu.effem.com
Seq primer: T3
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Mouse whole genome scaffolding with paired end reads from 10kb
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                                                                                                                                                   Email: ddunn@genetics.utah.edu
Insert Length: 10000 Std Error: 0.00
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Fax: 801 585 7177
                                                                                                                                                                                                                                                                                                           University of Utah
                                                                                                                                                                                                                                                                                                                                                      Contact: Robert B.
                                                                                                                                                                                                                                                                                                                                                                      Unpublished
                                                                                                                                                                                                                                                                                                                                                                                           plasmid inserts
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus
1 (bases 1 to 100)
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/organism="Mus musculus"
/mol_type="genomic DNA"
/strain="C57BL/6J"
/db_xref="taxon:10090"
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                                                                                                Socation/Qualifiers
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Amelonado type Cacao tree."
17 c 27 g 18 t 3 others
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mol_type="mRNA"
/strain="Amelonado type"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Contact: Robert Strausberg, Ph.D Email: cgapbs-r@mail.nih.gov Tissue Procurement: DCTD/DTP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      . Similarity
12; Conser
                                                                                                                                                                                                                                                                                                                                                                   found through the I.M.A.G.E. Consortium/LLNL at: http://image.llnl.gov plate: LLCM1317 row: b column: 22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1 (bases 1 to 44)
NIH-MGC http://mgc.nci.nih.gov/.
National Institutes of Health, Mammalian Gene Collection (MGC)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens
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602448881F1 NIH_MGC_14 Homo sapiens
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Mammalia; Eutheria; Primates;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               BG422154
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Jnpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             iomo sapiens (human)
                                                                                                                                                                                                                                                                                                                                                                                                                                                         DNA Sequencing by: Incyte Genomics, Inc. Clone distribution: MGC clone distribution information can
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              cDNA Library Preparation: Ling Hong/Rubin Laboratory cDNA Library Arrayed by: The I.M.A.G.E. Consortium (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              RGGCTAGCTACAA 13
                                                                                                                                                                                                                                                                                                                                            quality sequence stop: 44.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   23
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  polynucleotide kinase. Adaptor oligonucleotides were ligated to the blunt ends in high molar excess. The adaptored DNA was purified and size-selected for a 9.5 to 10.5 kb range using preparative agarose gel electrophoresis. Vector DNA was prepared from a derivative of pWD42 (gi|4732114|gb|AF129072.1), a copy-number inducible derivative of plasmid R1. The vector was ligated with adaptors complementary to the insert adaptors and purified. The sheared, adaptored mouse DNA was annealed to adaptored vector DNA, and transformed into chemically-competent B. coli XL10-Gold (Stratagene) cells and selected for ampicilin resistance."
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (http://www.jax.org/resources/documents/dnares/). The DNA was hydrodynamically sheared by repeated passage through a 0.005 inch orifice at constant velocity. The sheared DNA was blunt end-repaired with T4 DNA polymerase and T4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 musculus C57BL/6J (male) was obtained from the Jackson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            /lab_host="E. Coli strain XL10-Gold, T1-resistant, F
/clone_lib="Mouse 10kb plasmid UUGC1M library"
/note="Vector: PWD42nv; Purified genomic DNA from M.
/tissue_type="renal cell adenocarcinoma"
/lab_host="DH108 (phage-resistant)"
/clone_lib="NIH MGC 14"
/clone="Porgan: kidney; Vector: pOTB7; Site_1: XhoI; Site_2:
/note="Organ: kidney; Vector: pOTB7; Directionally
ECORI; CDNA made by Oligo-dT priming. Directionally
cloned into EcoRI/XhoI sites using the following 5'
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                                                                                                                                                                                                                                                                                                                 Location/Qualifiers
                                                                                                                                                                                   mol_type="munication:9606"
/db_xref="taxon:9606"
                                                                                                                                                                                                                         organism="Homo sapiens"
|mol_type="mRNA"
                                                                                                                                                                       clone="IMAGE:4587189"
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92.3%;
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Pred. No. 1.1e+04;
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1 (bases 1 to 26)

1 (bases 1 to 26)

1 (Alonso, J. M., Leisse, T. J., Barajas, P., Chen, H., Cheuk, R., Gadrinab, C., Jeske, A., Karnes, M., Kim, C. J., Parker, H., Prednis, L., Shinn, P., Zimmerman, J. and Ecker, J. R.

A Sequence-Indexed Library of Insertion Mutations in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Tel: 858 453 4100 x1752 Fax: 858 558 6379 Email: ecker@salk.edu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Salk Institute Genomic Analysis Laboratory (SIGnAL)
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 92037, USA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Arabidopsis thaliana
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Arabidopsis thaliana (thale cress)
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    GGCTAGCTACAA 13
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                                          Conservative
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a
                                                                                                                                                                                                                                                                                                                                                                                                                                                   TDNA tagged
                                                                                                                                         /db_xref="taxon:3702"
/clone="SALK 079024.36.15.x"
/clone="Farabidopsis thaliana TDNA insertion lines"
/clone="Farabidopsis thaliana TDNA insertion lines"
/note="PCR was performed on Arabidopsis thaliana lines
each of which contains one or more TDNA insertion
elements. The resultant fragment for each line was
directly sequenced to determine the genomic sequence at
the site of insertion. Details of the protocols used can
be found at http://signal.salk.edu/tdna_protocols.html"
a 6 c 3 g 11 t
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10 c 21 g 7 t
                                                                                                                                                                                                                                                                                                                                                    strain="Columbia 0"
                                                                                                                                                                                                                                                                                                                                                                     organism="Arabidopsis thaliana"
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81.2%;
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Pred. No. 1.4e+04;
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EST.
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                                                                    Umea Plant Science Center
Department of Plant Physiology
University of Umea, 901 87 Umea, Swed
Tel: +46 90 786 5279
Fax: +46 90 786 6676
Email: rupali bhalerao@plantphys.umu.
                                                                                                                                                                                                                                                                                                 Populus tremula x Populus tremuloides
Populus tremula x Populus tremuloides
Populus tremula x Populus tremuloides
Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosid
; eurosids I; Malpighiales; Salicaceae; Populus.
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Department of Plant Physiology
University of Umea, 901 87 Umea,
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Populus tremula x Populus tremuloides
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Eukaryota; Magnoliophyta; eudicotyledons; core eudicots; rosids
; eurosids I; Malpighiales; Salicaceae; Populus.
                                                                                                                                                                                     Contact: BHALERAO RUPALI R.
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/organism="Populus tremula x Populus
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|/db_xref="taxon:47664"
|/tissue type="imbibed seed"
|/clone_Tib="Populus imbibed seed cDNA library"
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Department of Plant Physiology
University of Umea, 901 87 Umea,
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Location/Qualifiers
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Fax: +46 90 786 6676
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/clone_Tib="Populus imbibed s
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                                                                                                                                                        Email: ddunn@genetics.utah.edu
Insert Length: 10000 Std Error:
Plate: 0452 row: D column: 18
Seq primer: CGTTGTAAAACGACGGCCAGT
Class: plasmid ends
High quality sequence stop: 80.
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Department of Plant Physiology
University of Umea, 901 87 Umea,
Tel: +46 90 786 5279
Fax: +46 90 786 6676
                                                                                                                                                                                                                                                                                                                University of Utah Genome Center
University of Utah
Rm. 308, Biomedical Polymers Research Bldg.,
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Mammalia, Eutheria, Rodentia, Sciurognathi, Muridae, Murinae, Mus
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Location/Qualifiers
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|/mol type="mRNA"
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/sex="Male"
'lab_host="E.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  75.0%;
85.7%;
                                                                                                                                                                                                                                                                                                                                                                             Weiss
                                                                                                                                                                                                                                                                                                                                                                                                                               scaffolding with paired
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 12; I
Pred. No. 2
Coli strain XL10-Gold,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sweden
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 13;
                                                                                                                                                                                                                                  0.00
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  .3e+04;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 100;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                 end reads
                                                                                                                                                                                                                                                                                                                       20 S.
T1-resistant,
                                                                                                                                                                                                                                                                                                                         2030
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       GSS 13-DEC-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                 from 10kb
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Murinae; Mus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                sequence tags
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E
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     genomic
                                                                                                                                                                                                                                                                                                                       SLC,
                                                                                                                                                                                                                                                                                                                         S
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               28
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         11;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.

1 (bases 1 to 52)

Hillier,L., Clark,N., Dubuque,T., Elliston,K., Hawkins,M., Holman,M., Hultman,M., Kucaba,T., Le,M., Lennon,G., Marra,M., Parsons,J., Rifkin,L., Rohlfing,T., Soares,M., Tan,F., Trevaskis,E., Waterston,R., Williamson,A., Wohldmann,P. and Wilson,R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           H08942 52 bp mRNA linear EST 23-JUN-199 y193e05.rl Soares infant brain 1NIB Homo sapiens cDNA clone IMAGE:45750 5' similar to gb|M87999|HUMALNE35 Human carcinoma cell-derived Alu RNA transcript, (rRNA); gb:M32315 TUMOR NECROSIS FACTOR RECEPTOR 2 PRECURSOR (HUMAN); mRNA sequence.
                                                                                                                                                                                                                                                                 High quality sequence starts: 1
High quality sequence stops: 1
Source: IMAGE Consortium, LINL
This clone is available royalty-free through LLNL; contact the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1 REGCTACCTACA 12
                                                                                                                                                                              IMAGE Consortium (info@image.llnl.gov)
Trace considered overall poor quality
Insert Length: 1449 Std Error: 0.00
                                                                                                                                                                                                                                                                                                                                                                                 Email: est@watson.wustl.edu
Insert Size: 1449
                                                                                                                                                                                                                                                                                                                                                                                                                                   Tel: 314 286 1800
Fax: 314 286 1810
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Washington University School of Medicine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Contact: Wilson RK
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  H08942.1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Homo sapiens (human)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AGGCTAGCTACA
                                                                                                                                                      primer: M13RP1
                                                                                                                   quality sequence stop: 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (http://www.jax.org/resources/documents/dnares/). The DNA was hydrodynamically sheared by repeated passage through a 0.005 inch orifice at constant velocity. The sheared DNA was blunt end-repaired with T4 DNA polymerase and T4 polymucleotide kinase. Adaptor oligonucleotides were ligated to the blunt ends in high molar excess. The adaptored DNA was purified and size-selected for a 9.5 to 10.5 kb range using preparative agarose gel electrophoresis. Vector DNA was prepared from a derivative of pNDA2 (gi|473214|gb|AF129072.1), a copy-number inducible derivative of plasmid R1. The vector was ligated with adaptors complementary to the insert adaptors and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              purified. The sheared, adaptored mouse DNA was annealed to adaptored vector DNA, and transformed into chemically-competent E. coli XLIO-Gold (Stratagene) cells and selected for ampicillin resistance. "

15 c 21 g 24 t
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/note="Vector: PWD42nv; Purified genomic DNA f
musculus C57BL/6J (male) was obtained from th
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Laboratory Mouse DNA Resource
/organism="Homo sapiens"
/mol_type="mRNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  GI:873764
                                                                                           ocation/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          72.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 11.6; DB 28;
Pred. No. 3.5e+04;
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                                                                                                                                                                                                                                               for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Louis, MO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Length
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    EST 23-JUN-1995
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Jackson
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RESULT 10 H08942

DEFINITION

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Matches

ORIGIN BASE COUNT

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VERSION KEYWORDS

ACCESSION

SOURCE

ORGANISM

REFERENCE

AUTHORS

COMMENT

FEATURES

source

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RESULT 11
N98196
LOCUS
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       TITLE
JOURNAL
MEDLINE
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AUTHORS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ORGANISM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           source
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  l (bases 1 to 74)

1 (bases 1 to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               30
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Orlando, FL 32816-2360
Tel: 407 384 2061
Fax: 407 384 3095
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Contact: Debopam Chakrabarti
Department of Molecular Biology
University of Central Florida
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Plasmodium falciparum (malaria parasite P. falciparum)
Plasmodium falciparum
Eukaryota, Alveolata, Apicomplexa, Haemosporida, Plasmodium.
1 (bases 1 to 74)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    N98196
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         N98196
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                2 GGCTAGCTACAAC 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                N98196.1 GI:1674562
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 clone PF0266C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0266C3
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            primer: T3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               8
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         dchak@pegasus.cc.ucf.edu
/lab host="E. coli XL-1 blue"
/clone lib="czapPFDd2.1, Debopam Chakrabarti"
/clone lib="czapPFDd2.1, Debopam Chakrabarti"
/note="vector: Lambda ZAP II; Site 1: EcoR I; Site 2: Xho
I; PolyA+ RNA, from asynchronous blood stage parasites of
the Dd2 isolate cultured in vitro, was reverse transcribed
using an oligo dT-Xho I primer. Second strand was
prepared using RNase H and DNA polymerase I. EcoR I
adapters were ligated to the cDNA, and it was digested
with Xho I. Prepared fragments were ligated into EcoR I +
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    double-stranded cDNA was ligated to Hind III adaptors (Pharmacia), digested with Not I and directionally cloned into the Not I and Hind III sites of the Action Library went through one round of normalization. Library constructed by Bento Soares and M.Fatima Bonaldo."

11 g 11 t 6 others
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/clone="PF0266C"
                                                                                                                                                                                                                                                                                                                                                                                                                                             힏
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       organism="Plasmodium falciparum"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    /sex="female"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             /clone="IMAGE:45750"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 /db_xref="GDB:418291"
/db_xref="taxon:9606"
                                                                                                                                                                                                                                                                                                                                                                                                      strain="Dd2"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      71.2%;
                                                                                                                                                                                                                                                                                                                                                                                                                                  type="mRNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     mRNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Debopam Chakrabarti Plasmodium falciparum cDNA
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Pred.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         74 bp
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No. 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  and Microbiology
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Chakrabarti, D., Christodoulou, Z.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  8e+04;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          В
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         EST 18-NOV-1996
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SOURCE

KEYWORDS

/ERSION

FEATURES

Matches

Query Match Best Local Similarity

71.2%;

Score 11.4; DB 29 Pred. No. 4.4e+04; 1; Mismatches 2

Length

76;

Indels

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Matches
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                               COUNT
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Zuechtungsforschung, Carl-von-Linne-Weg 10, Koeln, 50829, Germany This sequence is recovered from the left border of the T-DNA. It indicates an insertion close to or within gene At3g53040. The sequences are generated at the MPI for Plant Breeding Research in the context of the GABI-Kat project. GABI-Kat is part of the Germa Plant Genomics program designated 'GABI'. Information on line availability can be found at:

http://www.mpiz-koeln.mpg.de/GABI-Kat/.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ROSBO,M., Strizhov,N., Li,Y., Reiss,B., Dekker,K. and Weisshaar,B. A new Arabidopsis thaliana T-DNA mutagenised population (GABI-Kat) for flanking sequence tag based reverse genetics
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Arabidopsis thaliana
Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots;
rosids; eurosids II; Brassicales; Brassicaceae; Arabidopsis.
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12; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Direct Submission
Submitted (02-JUN-2003) Weisshaar B., Max-Planck-Institut fuer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Li,Y., Strizhov,N., Rosso,M. and Weisshaar,B. Direct Submission
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                A pipeline for automated high-throughput generation of FSTs (flanking sequence tags) from Arabidopsis thaliana T-DNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Strizhov, N., Li, Y., Rosso, M., Viehoever, P., Dekker, K., Saedler, H.
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                                                                    /db xref="taxon:3/04"
/clone="GK-514H05-019924"
/clone="GK-514H05-0199
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a 17 c 12 g 14 t 13 othe
                                                                                                                                                                                                                                                                                                                                                                                                                                                                /organism="Arabidopsis thaliana"
|mol_type="genomic DNA"
|strain="Columbia_0"
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Pred. No. 4.4e+04;
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flanking sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Shoemaker,R., Keim,P., Vodkin,L., Erpelding,J., Coryell,V., Khanna,A., Bolla,B., Marra,M., Hillier,L., Kucaba,T., Martin,J., Beck,C. Wylie,T., Underwood,K., Steptoe,M., Theising,B., Allen,M., Bowers,Y., Person,B., Swaller,T., Gibbons,M., Pape,D., Harvey,N., Schurk,R., Ritter,E., Kohn,S., Shin,T., Jackson,Y., Cardenas,M., McCann,R., Waterston,R. and Wilson,R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AI461140 95 bp mRNA 8a75f01.y1 Gm-c1004 Glycine max cDNA clone Gm-c1004-5138 5', mRNA sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Email: est@watson.wustl.edu
This clone is available through: ResGen, Invitrogen Corp.
South Memorial Parkway Huntsville, AL 35801 For further ir
call: (800)-533-4363 or contact via email: ccu@resgen.com
Insert Length: 369 Std Error: 0.00
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Bukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids
; eurosids I; Fabales; Fabaceae; Papilionoideae; Phaseoleae;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Glycine max
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Public Soybean EST Project
Washington University School of Medicine
4444 Forest Park Parkway, Box 8501, St. Louis, MO 63108, USA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Glycine max (soybean)
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314 286 1810
second-strand synthesis, the cDNA ends were 'polished'
with clone Pfu DNA polymerase, ligated to EcoRI adapters,
and phosphorylated. The XhoI site within the first-strand
synthesis primer was restricted by digestion with XhoI,
all XhoI sites in the cDNA would be protected by their
hemimethylated status. The cDNA constructs were
size-fractionated with a 500bp cutoff, using GibcoBRL Life
Technologies' cDNA Size Fractionation column. The column
eluent was then ligated into Stratagene's pBluescript II
XR Predigested vector (pBluescript II SK(+) that had been
digested with EcoRI and XhoI, and phosphorylated). Both
the white and blue colonies appear to contain recombinant
                                                                                                                                                                                                                                                                                                                            Location/Qualifiers
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clone="GENOME SYSTEMS CLONE ID: Gm-c1004-5138"
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GENOME SYSTEMS CLONE ID:
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                 Query Match
Best Local 9
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12;
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Grossman,A., Chang,C.-W., Davies,J., Harris,E., Hauser,C., Lefebvre,P., McDermott,J.P., Shrager,J., Silflow,C. and Stern,D.
Analyses of the Chlamydomonas reinhardtii Genome: A Model,
Unicellular System for Analyzing Gene Function and Regulation in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1 RGGCTAGCTACAACG 15
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Chlamydomonas reinhardtii
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Tel: 919 613 8159
Fax: 919 613 8177
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Unpublished
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EST.
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                     Similarity
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Conservative
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                                                                                                        /mol type="mRNA"
/strain="CC-1690 wild type mt+ 21gr"
/db_xref="taxon:3055"
/db_xref="taxon:3055"
/db_xref="taxon:3055"
/clone lib="C. reinhardtii CC-1690, Deflagellation
/clone lib="C. reinhardtii CC-1690, Deflagellation
/normalized), Lambda Zap II"
/note="vector: pBluescript II SK-; Site_1: EcoRI; Site_2:
xhoI, Deflagellation library, constructed by John Davies
and Jeffrey McDermott, combines cDNAs from CC-1690 cells
which had been re-synthesizing flagella from T15, 30 and 60
min after being deflagellated by pH shock. PolyA mRNA was
purified from each sample, pooled and cDNA synthesized.
The cDNA was directionally cloned into lambda Zap II
(Stratagene) in the EcoRI (5') and xhoRI (3') sites.
pBluescript II SK- plasmids were excised from the lambda
ZAP clones by superinfection with ExAssist (Stratagene)
phage. The library was normalized using method 4 described
in Bonaldo et al., (1996) Genome Research 6: 791-806."
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           chauser@duke.edu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 sequenced, and possess putative cDNA inserts. This library was constructed by Dr. Paul Keim & Virginia H. Coryell, Department of Biology, Box5640, Northern Arizona University, Flagstaff, Az 86011, Phone: 520-523-1078 (Dr. Paul Keim), 520-523-1372 (Virginia H. Coryell), Fax: 520-523-7500, email: paul.keim@nau.edu, virginia.coryell@nau.edu" 25 c 18 g 27 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 /organism="Chlamydomonas reinhardtii"
/mol_type="mRNA"
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                     71.2%;
92.3%;
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Pred. No. 4.8e+04;
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RESULT 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              12;
            A pipeline for automated high-throughput generation of FSTs (flanking sequence tags) from Arabidopsis thaliana T-DNA transformed lines
                                                                                                                            Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids; eurosids II; Brassicales; Brassicaceae; Arabidopsis.
                                                                                                                                                                                          Arabidopsis thaliana (thale cress)
Arabidopsis thaliana
                                                                                                                                                                                                                                                                       genomic survey sequence BX288422
                                                                                                                                                                                                                                                                                                        BX288422 58 bp DNA linear GSS 07-MAR-2003 Arabidopsis thaliana T-DNA flanking sequence GK-414B10-018037,
                                                                           and Weisshaar, B.
                                                                                                                                                                                                                                                     BX288422.1 GI:28887418
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Fax: 573 884 7850
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Missouri Maize Project--Maize Mapping Project
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96 bp DNA linear GSS 15-MA
PstI_3_a8-c-1_0 Maize PstI B73 Leaf Zea mays genomic, genomic
survey sequence.
                                                                                       Strizhov, N., Li, Y., Rosso, M., Viehoever, P., Dekker, K., Saedler, H.
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209 Curtis Hall, Columbia, MO 65211, USA
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PstI Zea mays B73 PstI leaf tissue library
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Spermatophyta, Magnoliophyta, Liliopsida, Poales, Poaceae, PACCAD
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                /lab_host="DH5 alpha"
/clone lib="Maize PstI B73 Leaf"
/clone lib="Maize PstI B73 Leaf"
/note="Organ: Leaf; Vector: PUC19; PstI digested B73
/note="Organ: Leaf; Vector: FUC19; PstI digested B73
genomic sucrose gradient size fractionated fragment sizes
of 0.5kb to 2kb ligated to PUC19 transformed in DH5 alpha"
a 29 c 27 g 18 t
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/cultivar="873"
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Pred. No. 4.8e+04;
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                                                                                                                                                      Bukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.

1 (Dases 1 to 73)

Hillier,L., Clark,N., Dubuque,T., Elliston,K., Hawkins,M., Holman,M., Hultman,M., Kucaba,T., Le,M., Lennon,G., Marra,M., Parsons,J., Rifkin,L., Rohlfing,T., Soares,M., Tan,F., Trevaskis,E., Waterston,R., Williamson,A., Wohldmann,P. and Wilson,R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Zuechtungsforschung, Carl-von-Linne-Weg 10, Koeln, 50829, Germany This sequence is recovered from the left border of the T-DNA. It indicates an insertion close to or within gene At1953810. The sequences are generated at the MPI for Plant Breeding Research in the context of the GABI-Kat project. GABI-Kat is part of the Germ Plant Genomics program designated 'GABI'. Information on line availability can be found at:

http://www.mpiz-koeln.mpg.de/GABI-Kat/.
                     Tel: 314 286 1800
Fax: 314 286 1810
                                                                                                             Unpublished
Contact: Wilson RK
                                                                                                                                                                                                                                                                                                                                                                                           EST
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              yr46e04.sl Soares fetal liver spleen 1NFLS Homo sapiens cDNA clone IMACE:208350 3' similar to gb:M22918 MYOSIN LIGHT CHAIN ALKALI,
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                                                                Washington University School of Medicine
4444 Forest Park Parkway, Box 8501, St. Louis, MO 63108
                                                                                                                                                                                                                                                                                                                                           Homo sapiens
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Strizhov, N., Rosso, M., Li, Y. and Weisshaar, B.
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A new Arabidopsis thaliana T-DNA mutagenised population (GABI-Ka
                                                                                                                                                                                                                                                                                                                                                                Homo sapiens (human)
                                                                                                                                                                                                                                                                                                                                                                                                                  H62825.1 GI:1017171
                                                                                                                                                                                                                                                                                                                                                                                                                                                         SMOOTH-MUSCLE ISOFORM
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Direct Submission
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est@watson.wustl.edu
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          /clone lib="Arabidopsis thaliana T-DNA insertion lines"
/note="PCR was performed on DNA from Arabidopsis thaliana
plants (T1) which were transformed with the T-DNA from
vector pAC161. The lines contain one or more T-DNA
insertions. The DNA fragment(s) resulting from the PCR
were directly sequenced to determine the genomic sequence
flanking the insertion. Sequences displaying significant
similarity to the A. thalaina nuclear genome sequence were
processed for submission. T-DNA derived sequences were
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  organism="Arabidopsis thaliana"
/mol type="genomic DNA"
/strain="Columbia 0"
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Pred. No.
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. 6.6e+04;
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RESULT 18
BI865456
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High
Email: zbrafish@watson.wustl.edu
cDNA Library constructed by S. Lin DNA Sequencing by: Washington
University Genome Sequencing Center Clone distribution: the
I.M.A.G.E. Consortium/LLNL, send email to: info@image.llnl.gov
                                                                                                         Contact: Stephen L. Johnson
Washington University School of Medicine
4444 Forest Park Parkway, Box 8501, St. J
                                                                                                                                                                                                                   Clark, M., Johnson, S.L., Lehrach, H., Lee, R., Li, F., Marra, M., Eddy, S., Hillier, L., Kucaba, T., Martin, J., Beck, C., Wylie, T.; Underwook, S., Steptoe, M., Theising, B., Allen, M., Bowers, Y., Person, B., Swaller, T., Gibbons, M., Pape, D., Harvey, N., Schurk, R., Ritter, E., Schun, S., Shin, T., Jackson, Y., Cardenas, M., McCann, R., Waterston, R.
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High quality sequence stop: 1.
Location/Qualifiers
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                                                                             Tel: 314 286 1800
Fax: 314 286 1810
                                                                                                                                                                                                                                                                                                                              Bukaryota; Metazoa; Chordata; Craniata; Vertebrata; Buteleostomi;
Actinopterygii; Neopterygii; Teleostei; Ostariophysi; Cypriniformes; Cyprinidae; Danio.
                                                                                                                                                                                                                                                                                                                                                                                         Danio rerio
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ft22h12.xl Zebrafish neuronal
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Source: IMAGE Consortium, LLNL
                                                                                                                                                                    WashU Zebrafish EST Project 1998
Unpublished
                                                                                                                                                                                                         and Wilson, R.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                , mRNA sequence.
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(mol_type="mRNA"
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Pred. No. 7.2e+04;
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MAGE:5082479
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                                                                                                                                                                                                                                                                   High quality sequence stop: 84.
                                                                                                                                                                                                                                                                                                     Email: ddunn@genetics.utah.edu
Inmert Length: 10000 Std Error: 1
Plate: 0208 row: H column: 05
Seq primer: CACACAGGAAACAGCTATGACC
                                                                                                                                                                                                                                                                                                                                                                                                                                            University of Utah Genome Center
University of Utah
Rm. 308, Biomedical Polymers Research Bldg.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Dunn,D., Aoyagi,A., Barber,M., Beacorn,T., Duval,B., Hamil,C., Islam,H., Longacre,S., Mahmoud,M., Meenen,E., Pedersen,T., Reilly,M., Rose,R., Stokes,R., Tingey,A., von Niederhausern,A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mus musculus (house mouse)
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                                                                                                                                                                                                                                                                                                                                                                                      Tel: 801 585 5606
Fax: 801 585 7177
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Contact: Robert B.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mouse whole genome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AZ946645.1 GI:13816823
                                                                                                                                                                                                                                                                                       Class: plasmid ends
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   and Wright, D., Weiss, R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AZ946645
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/lab_host="DH10B (phage-resistant)"
/lab_host="DH10B (phage-resistant)"
/clone libs"Zebrafish neuronal"
/note="Organ: brain; Vector: pBluescript (modified);
Site 1: DraIII(Y); Site 2: DRAIII(X); Library is cloned directionally between the DraIII(X) and DraIII(Y) sites and has been amplified. Library constructed by S. Lin. "
a 14 c 7 g 42 t
                                      /lab host="E. coli strain XL10-Gold, T1-resistant, F-"
/clone lib="Mouse 10kb plasmid UUGC2M library"
/note="Vector: PW02ru; Purified genomic DNA from M.
musculus C57BL/6J (female) was obtained from the Jackson
                                                                                                                                                                    /organism="Mus musculus"
/mol_type="genomic DNA"
/strain="C57BL/6J"
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/mol_type="mRNA"
/db_xref="taxon:7955"
                Laboratory Mouse DNA Resource
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(http://www.jax.org/resources/documents/dnares/). The DNA
                                                                                                                                  /db_xref="taxon:10090"
/clone="UUGC2M0208H05"
                                                                                                                                                                                                                                               ocation/Qualifiers
                                                                                                                  sex="Female"
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d UUGC2M library Mus
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7.5e+04;
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E., Pedersen,T., Rei
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                                                                                                                                                                                                                                                                                                                                                                                                                                       CDNA Library Arrayed by: Greg Lennon, Ph.D.
DNA Sequencing by: Washington University Genome Sequencing Center
Clone distribution: NCI-CGAP clone distribution information can be
found through the I.M.A.G.E. Consortium/LLNL at:
www-bio.llnl.gov/bbrp/image/image.html
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1 (bases 1 to 90)

NCI/NINDS-CGAP http://www.ncbi.nlm.nih.gov/ncicgap.

National Cancer Institute / National Institute of Neurological

Disorders and Stroke, Brain Tumor Genome Anatomy Project
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     wp83a12.x1 NCI_CGAP_Brn25 Homo sapiens cDNA clone IMAGE:2468350 3' similar to gb:X63563 DNA-DIRECTED RNA POLYMERASE II 140 KD POLYPEPTIDE (HUMAN);, mRNA sequence.
                                                                                                                                                                                                                                                                                                                                                                  Trace considered overall poor quality Insert Length: 764 Std Error: 0.00
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Email: cgapbs-r@mail.nih.gov
Tissue Procurement: David N. Louis, M.D., Myrna R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Contact: Robert Strausberg, Ph.D.
Email: cgapbs-r@mail.nih.gov
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (CGAP/BTGAP), Tumor Gene Index
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cDNA Library Preparation: M. Bento Soares, Ph.D.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             RGGCTAGCTACAA 13
                                                                                                                                                                                                                                                                                                                                         primer: -40UP from Gibco
                                                                                                                                                                                                                                                                                                               quality sequence stop: 1.
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/clone_lib="NCI_CGAP_Brn25"
/note="Organ: brain; Vector: pT7T3D-Pac (Pharmacia) with
modified polylinker; Site_1: Not I; Site_2: Eco RI; 1st
                                                                                        /organism="Homo sapiens"

/mol type="mRNA"

/db_xref="taxon:9606"

/clone="IMAGE:2468350"

/tissue_type="anaplastic oligodendroglioma"

/lab_host="DH10B"
                                                                                                                                                                                                                                                                                  Location/Qualifiers
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7.6e+04;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Tel: 858 453 4100 x1752
Fax: 858 558 6379
Email: ecker@salk.edu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Salk Institute Genomic Analysis Laboratory
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 9:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Alonso,J.M., Leisse,T.J., Barajas,P., Chen,H., Cheuk,R.,
C., Jeske,A., Karnes,M., Kim,C.J., Parker,H., Prednis,L
, Zimmerman,J. and Ecker,J.R.
A Sequence-Indexed Library of Insertion Mutations in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosid; eurosids II; Brassicales; Brassicaceae; Arabidopsis.
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GSS.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SALK 087935 Arabidopsis thaliana TDNA insertion lines Arabidopsis thaliana genomic clone SALK_087935, genomic survey sequence.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              This is single pass sequence recovered from the left border of TDNA. This sequence lies within an annotated exon of At2g27170.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Arabidopsis Genome 
Unpublished
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Contact: Joseph R. Ecker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Arabidopsis thaliana (thale cress)
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  AGGCTATCTACAA 53
                                    RGGCTAGCTACAA 13
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                                                                             Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                            TDNA tagged
                                                                                                                                                                       /clone="SALK 087935"
/clone lib="Arabidopsis thaliana TDNA insertion lines"
/note="FCR was performed on Arabidopsis thaliana lines
each of which contains one or more TDNA insertion
elements. The resultant fragment for each line was
directly sequenced to determine the genomic sequence at
the site of insertion. Details of the protocols used can
be found at http://signal.salk.edu/tdna_protocols.html"
a 17 c 14 g 25 t
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10 C 16 g 39 t
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                                                                                                                                                                                                                                                                                                                                                                          organism="Arabidopsis"
/mol_type="genomic DNA"
/strain="Columbia 0"
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                                                                                                68.8%;
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84.6%;
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Pred. No. 7.8e+04;
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Pred. No. 7.8e+04;
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AG224693
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                                                                                                                                                                                                                                                                                                                                                                             96 bp DNA linear GSS 03-OCT-201
1M0216F14F Mouse 10kb plasmid UUGC1M library Mus musculus genomic
clone UUGC1M0216F14 F, genomic survey sequence.
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Lotus japonicus DNA, clone:LjBl1a20_f, genomic survey sequence
AG224693
                                                                                                                                          Dunn,D., Aoyagi,A., Barber,M., Beacorn,T., Duval,B., Hamil,C., Islam,H., Longacre,S., Mahmoud,M., Meenen,E., Pedersen,T., Reilly,M., Rose,M., Rose,R., Stokes,R., Tingey,A., von Niederhausern,A., and Wright,D., Weiss,R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       11;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Submitted (20-NOV-2002) Shusei Sato, Kazusa DNA Research Institute, The First Laboratory for Plant Gene Research; 2-6-7 Kazusa-kamatari, Kisarazu, Chiba 292-0818, Japan (E-mail:ssato@kazusa.or.jp, URL:http://www.kazusa.or.jp/en/plant/, Tel:81-438-52-3935(ex.2336), Fax:81-438-52-3934)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sato, S., Nakamura, Y. and Tabata, S. Lotus japonicus BAC End sequences Published Only in Database (2002) 2 (bases 1 to 91)
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Contact: Robert B. Weiss
University of Utah Genome Center
University of Utah
Rm. 308, Biomedical Polymers Research Bldg.,
                                                                                                                                                                                                                      Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus 1 (bases 1 to 96)
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                                                                                     Unpublished
                                                                                                      plasmid inserts
                                                                                                                                                                                                                                                                                          Mus musculus
                                                                                                                                                                                                                                                                                                                                                    AZ431360.1 GI:10555373
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                                                                                                                                                                                                                                                                                                           Mus musculus (house mouse)
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                                                                                                                             whole genome
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/mol_type="genomic DNA"
/strain="Miyakojima MG-20"
/db_xref="taxon:34305"
/clone="Ljb="genomic BAC library"
/clone="Uperomic BAC library"
/note="VECTOR:DBeloBAC11"
/note="VECTOR:DBeloBAC11"
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                                                                                                                       scaffolding with paired end reads
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ORGANISM
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                                                                               Contact: Robert Strausberg, Ph.D.
Email: cgapbs-r@mail.nih.gov
Tissue Procurement: Christopher Moskaluk, M.D.,
Emmert-Buck, M.D., Ph.D.
                                                                                                                                                                                                                                                                                                                                                                                            Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo. 1 (bases 1 to 49)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            tx44d07.x1 NCI_CGAP_Lu24 Homo sapiens cDNA clone IMAGE:2272429 similar to SW:R23A_HUMAN_P54725 UV EXCISION REPAIR PROTEIN PROT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             4 GGGCTAGCCACAA 16
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Insert Length: 10000 Std Error:
Plate: 0216 row: F column: 14
Seg primer: CGTTGTAAAACGACGGCCAGT
                                                                                                                                                                                                                                                                                                                     NCI-CGAP http://www.ncbi.nlm.nih.gov/ncicgap.
National Cancer Institute, Cancer Genome Anat
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Location/Qualifiers
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Fax: 801 585 7177
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                                                                                                                                                                                                                                          Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
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cDNA Library Preparation: M. Bento Soares, Ph.D. cDNA Library Arrayed by: Greg Lennon, Ph.D.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    sapiens (human)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (http://www.jax.org/resources/documents/dnares/). The DNA was hydrodynamically sheared by repeated passage through a 0.005 inch orifice at constant velocity. The sheared DNA was blunt end-repaired with T4 DNA polymerase and T4 polynucleotide kinase. Adaptor oligonucleotides were ligated to the blunt ends in high molar excess. The adaptored DNA was purified and size-selected for a 9.5 to 10.5 kb range using preparative agarose gel electrophoresis. Vector DNA was prepared from a derivative of pWD42 (gi |4732114 |gb |AF129072.1), a copy-number inducible derivative of plasmid R1. The vector was ligated with adaptors complementary to the insert adaptors and purified. The sheared, adaptored mouse DNA was annealed to adaptored vector DNA, and transformed into chemically-competent B. coli XL10-Gold (Stratagene) cells and selected for ampicillin resistance."
                                                                                                                                                                                                                                                                                        Gene Index
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/note="Vector: PWD42nv; Purified genomic DNA f
musculus C57BL/6J (male) was obtained from th
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/strain="C57BL/6J"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                clone="UUGC1M0216F14"
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Pred. No. 8e+04;
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                                                                                                                             Ph.D.,
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FEATURES
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   29
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                                                                                                                                                                                                                                                                                                                                                                                               Suzuki,Y., Taira,H., Tsunoda,T., Mizushima-Sugano,J., Sese,J., H., Ota,T., Isogai,T., Tanaka,T., Morishita,S., Okubo,K., Sakaki,Y., Nakamura,Y., Suyama,A. and Sugano,S.
Diverse transcriptional initiation revealed by fine, large-scale mapping of mRNA start sites
EMBO Rep. 2 (5), 388-393 (2001)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AU106358 Sugano Homo sapiens cDNA library Homo sapiens cDNA library Homo sapiens cDNA HEP02980, mRNA sequence.
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AU106358.1 GI:13555879
                                                                                                                         Department of Virology
Institute of Medical Science, University of Tokyo
Institute of Medical Science, University of Tokyo
4-6-1, Shirokanedai, Minatoku, Tokyo 108-8639, Japan
Email: ysuzuki@ims.u-tokyo.ac.jp
Email: ysuzuki@ims.u-tokyo.ac.jp
Suzuki,Y., Yoshitomo-Nakagawa,K., Maruyama,K., Suyama,A. and Sugano
Suzuki,Y., Yoshitomo-Nakagawa,K., Maruyama,K., Suyama,A. and Sugano
,S. Construction and characterization of a full length-enriched and
,S. Construction and characterization of a full length-enriched and
,S. cend-enriched cDNA library. Gene 200 (1-2), 149-156 (1997).

a 5'-end-enriched cDNA library.
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/lab_host="DH10B"
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/mol_type="mRNA"
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/organism="Homo sapiens"
/mol type="mRNA"
/db_xref="taxon:9606"
/clone="HEP02980"
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85.7%;
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Pred. No. 8e+04;
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Best Local Similarity
Matches 12; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                3 GCTAGCTACAACGA 16
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1 (bases 1 to 52)
1 (bases 1 to 52)
1 (bases 1 to 52)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               IMAGE Consortium (info@image.linl.gov) for further i Trace considered overall poor quality possible reversed clone: similarity on wrong strand seq primer: -28ml3 rev2 ET from Amersham High quality sequence stop: 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Pax: 314 200 10-1
Email: estewatson.wustl.edu
This clone is available royalty-free through LLNL; contact the
This clone is available royalty-free through LLNL; contact the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AA425092.1
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Fax: 314 286 1810
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4444 Forest Park Parkway, Box 8501, St. Louis,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Contact: Wilson RK
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                                                                                                                                                                                                /clone_lib="Soares NhHMPu_S1"
/clone_lib="Soares NhHMPu_S1"
/note="Organ: mixed (see_below); Vector: pT73D-Pac
/pharmacia) with a modified polylinker; Site_1: Not I;

gite_2: Eco RI; Equal amounts of plasmid DNA from theres
normalized libraries (melanocyte 2NbHM, pregnant uterus
normalized in vitro. Following HAP purification, this DNA
was used as tracer in a subtractive hybridization
was used as tracer in a subtractive hybridization
reaction. The driver was PCR-amplified CDNAs from pools of
reaction. The driver was PCR-amplified CDNAs from pools
of s,000 clones made from the same 3 libraries. The pools
consisted of I.M.A.G.E. clones 260232-265223,
340488-345479, and 484488-489479."
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/lab_host="DH10B"
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/mol_type="mRNA"
/db_xref="GDB:5975323"
/db_xref="taxon:9606"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  tissue_type="Pooled human melanocyte, fetal heart,
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Pred. No. 8e+04;
0; Mismatches
                                                       Score 10.8; DB 9
Pred. No. 8.2e+04
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                  AA433099
AA433099.1
EST.
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                                                                                              vd94e08.rl Soa
5' similar to
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                                                                                                                                                                                                                                                                                 1 RGGCTACCTACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Salk Institute Genomic Analysis Laboratory (SIGnAL)
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 92037, USA
Tel: 858 453 4100 x1752
Fax: 858 558 6379
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosid; eurosids II; Brassicales; Brassicaceae; Arabidopsis.
                                                                                                                                          AA433099
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    This is single pass sequence recovered from the left border of TDNA. This sequence lies within an annotated intron of At4g38910.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Contact: Joseph R. Ecker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Alonso,J.M., Leisse,T.J., Barajas,P., Chen,H., Cheuk,R.,,C., Jeske,A., Karnes,M., Kim,C.J., Parker,H., Prednis,L, Zimmerman,J. and Ecker,J.R.
A Sequence-Indexed Library of Insertion Mutations in the
                                                                                sequence.
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  musculus (house mouse)
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                                                                                                                                                                                                                                                                                                                                                                                                                        /clone="SALK_131129.40.10.x"
/clone lib="Arabidopsis thaliana TDNA insertion lines"
/note="PCR was performed on Arabidopsis thaliana lines
each of which contains one or more TDNA insertion
elements. The resultant fragment for each line was
directly sequenced to determine the genomic sequence at
the site of insertion. Details of the protocols used can
be found at http://signal.salk.edu/tdna_protocols.html"
a 11 c 8 g 17 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                /mol_type="genomic D
/strain="Columbia 0"
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                                                                                            58 bp mRNA linear EST 22:
Soares mouse NbMH Mus musculus cDNA clone IMAGE
to SW:ATP6_MOUSE P00848 ATP SYNTHASE A CHAIN ;,
                                        GI:2116529
                                                                                                                                                                                                                                                                                                                                      67.5%;
75.0%;
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Pred. No. 8.2e+04;
1; Mismatches 3;
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                                                                                                                   IMAGE:808262
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AZ342599/c
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Best Local
                                                                   ORGANISM
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Marra,M., Hillier,L., Allen,M., Bowles,M., Dietrich,N., Dubuque,T., Geisel,S., Kucaba,T., Lacy,M., Le,M., Martin,J., Morris,M., Schellenberg,K., Steptoe,M., Tan,F., Underwood,K., Moore,B., Theising,B., Wylie,T., Lennon,G., Soares,B., Wilson,R. and Waterston,R.
                                                                                                                                                                                                                                                                                                                                                l Similarity
12; Conserv
       Mus musculus
Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus.

1 (bases 1 to 59)
                                                                                                                                                   AZ342599 59 bp DNA linear GSS 2: 1M0075C18R Mouse 10kb plasmid UUGC1M library Mus musculus clone UUGC1M0075C18 R, genomic survey sequence.
                                                                                                                                                                                                                                                                                                               w
                                                                                 AZ342599
AZ342599.1 GI:10419997
GSS.
Mus musculus (house mouse)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Possible reversed clone: similar Seq primer: -28m13 rev2 ET from High quality sequence stop: 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Tel: 314 286 1800 Fax: 314 286 1810
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Contact: Marra M/Mouse EST project
WashU-HHMI Mouse EST project
WashIngton University School of MedicineP
4444 Forest Park Parkway, Box 8501, St. Louis, MO 63108
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mus musculus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Trace considered overall poor quality Possible reversed clone: similarity or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              The WashU-HHMI Mouse EST Project
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   MGI:484606
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   This clone is available royalty-free through LLNL; contact the IMAGE Consortium (info@image.llnl.gov) for further information.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Email: mouseest@watson.wustl.edu
                                                                                                                                                                                                                                                                                                         GCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                              GATGGCTACAACGA 3
                                                                                                                                                                                                                                                                                                                                                 Conservative
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Bonaldo "
a 18 c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    /dev_stage="4 weeks"
/lab_host="DH10B"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        organism="Mus musculus"
|mol_type="mRNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        db_xref="taxon:10090"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     sex="male"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      clone="IMAGE: 808262"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      strain="C57BL/6J"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 tissue_type="heart"
                                                                                                                                                                                                                                                                                                                                                                  67.5%;
Barber, M.,
                                                                                                                                                                                                                                                                                                                                                 0,
                                                                                                                                                                                                                                                                                                                                                              Score 10.8; DB 9;
Pred. No. 8.5e+04;
                                                                                                                                                                                                                                                                                                                                                                                                                                     49
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Beacorn, T.,
                                                                                                                                                                                                                                                                                                                                                                                                                                       20 t
                                                                                                                                                                                                                                                                                                                                                                                  DB 9;
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Duval, B.,
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COMMENT
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DEFINITION
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VERSION
                                                                                                            SOURCE
                                                                                                                                                                                                                                                                                                                                                   RESULT 30
REFERENCE
                                                                                                                                                  KEYWORDS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local
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                                                                                          ORGANISM
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Mouse whole genome scaffolding with paired end reads from 10kb
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Contact: Robert B. Weiss
University of Utah Genome Center
University of Utah
Rm. 308, Biomedical Polymers Research Bldg., 20 S. 2030 E., SLC,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     plasmid inserts
Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Seq primer: CACACAGGAAACAGCTATGACC Class: plasmid ends
High quality sequence stop: 59.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Email: ddunn@genetics.utah.edu
Insert Length: 10000 Std Erro
Plate: 0075 row: C column: 18
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Fax: 801 585 7177
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1 RESCTASCTACAACGA 16
Zygosaccharomyces rouxii
Zygosaccharomyces rouxii
Zygosaccharomyces rouxii
Eukaryota; Fungi; Ascomycota; Saccharomycotina; Saccharomyces.
Saccharomycetales; Saccharomycetaceae; Zygosaccharomyces.
1 (bases 1 to 60)
                                                                                                                                                                        Zygosaccharomyces rouxi
AL394587
AL394587.1 GI:12145628
                                                                                                                                                                                                                                60 bp DNA linear GSS 17-JUN-2001 T3 end of clone AROAA018A08 of library AROAA from strain CBS 732 of Zygosaccharomyces rouxii, genomic survey sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                   AGGATAGCTAAAACAA 20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                was hydrodynamically sheared by repeated passage through a was hydrodynamically sheared by repeated passage through a 0.005 inch orifice at constant velocity. The sheared DNA 0.005 inch orifice at constant velocity. The sheared DNA was blunt end-repaired with T4 DNA polymerase and T4 polymucleotide kinase. Adaptor oligonucleotides were polymucleotide kinase. Adaptor oligonucleotides were polymucleotide was purified and size-selected for a 9.5 to adaptored DNA was purified and size-selected for a 9.5 to electrophoresis. Vector DNA was prepared from a derivative electrophoresis. Vector DNA was prepared from a derivative of pWD42 (gi|4732114|gb|AF129072.1), a copy-number of pWD42 (gi|4732114|gb|AF129072.1), a copy-number inducible derivative of plasmid R1. The vector was ligated with adaptors complementary to the insert adaptors and with adaptors complementary to the insert adaptors and purified. The sheared, adaptored mouse DNA was annealed to purified. The sheared, and transformed into adaptored vector DNA, and transformed into chemically-competent E. coli XL10-Gold (Stratagene) cells and selected for ampicillin resistance."
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               USA
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/clone lib="Mouse 10kb plasmid UUGCIM library"
/note="Vector: PWD42nv; Purified genomic DNA from M.
musculus C57BL/6J (male) was obtained from the Jackson
laboratory Mouse DNA Resource
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    /db_xref="taxon:10090"
/clone="UUGC1M0075C18"
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/strain="C57BL/6J"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              organism="Mus musculus"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (http://www.jax.org/resources/documents/dnares/).
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75.0%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 10.8; DB 28; Length 59; Pred. No. 8.6e+04;
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AUTHORS
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ORGANISM
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               2 (bases 1 to 60)
de Montigny,J., Straub,M., Potier,S., Tekaia,F., Dujon,B.,
Wincker,P., Artiguenave,F. and Souciet,J.
Genomic exploration of the hemiascomycetous yeasts: 8.
Zygosaccharomyces rouxii
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Genomic exploration of the hemiascomycetous yeasts: 1. A set of yeast species for molecular evolution studies FEBS Lett. 487 (1), 3-12 (2000) 20584711
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                                                                                                                                                                                                                                                                                                                                                                                           AA070413 61 bp mRNA linear EST 23-DEC-199' zm68cll.rl Stratagene neuroepithelium (#937231) Homo sapiens cDNA clone IMAGE:530804 5' similar to SW:ATP6_MOUSE P00848 ATP SYNTHASE
                                                                                                                                                                                                                                                                                                                                             A CHAIN ;, mRNA sequence. AA070413
                                              Hiller, I., Lennon, G., Becker, M., Bonaldo, M.F., Chiapelli, B., Hawkins Chiasoe, S., Dietrich, N., Dubuque, T., Favello, A., Gish, W., Hawkins, M., Hultman, M., Kucaba, T., Lacy, M., Le, M., Le, N., Mardis, B.; Moore
                                                                                                                               Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
1 (bases 1 to 61)
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                                                                                                                                                                                                                                                  Homo sapiens (human)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            GCCTÁGCCANAACGA 21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 GGCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           17
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/note="end : T3"
25 c 11 g
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/clone="AROAA018A08"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       mol type="genomic DNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            organism="Zygosaccharomyces rouxii"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     487 (1),
                                                                                                                                                                                                                                                                                                                       GI:1577774
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Pred. No. 8.6e+04;
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VERSION
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D12015/c
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                                                                                                                                                                                                                                                                                                               Shoo
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    IMAGE Consortium (info@image.llnl.gov) for fu
Possible reversed clone: similarity on wrong
Insert Length: 3173 Std Error: 0.00
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WARNING: There is evidence that suggests that the 384-well parent plate of this clone contains both human and mouse derived clones. Thus, the origin of this clone is uncertain. This caution should kept in mind should you use this clone.
                                                                                                                                                   Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      This clone is available royalty-free through LLNL; contact the IMAGE Consortium (info@image.llnl.gov) for further information.
Contact: Kousaku Okubo, Naohiro Hori, Ryo Matoba,
                                              qualitative aspects of Nat. Genet. 2, 173-179
                                                  Large scale cDNA sequencing for analysis qualitative aspects of gene expression Nat. Genet. 2, 173-179 (1992)
                                                                                                        and Matsubara, K.
                                                                                                                                                                                       Homo sapiens
                                                                                                                                                                                                                                         D12015.1
                                                                                                                                                                                                                                                         D12015
                                                                                                                                                                                                                                                                         mRNA sequence.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Tel: 314 286 1800
Fax: 314 286 1810
Email: est@watson.wustl.edu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Washington University
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Contact: Wilson RK
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      8889549
                                                                                                                                                                                                     iomo sapiens (human)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Similarity
                                                                                                                                                                                                                                                                                                                                                                                                 GATGGCTACAACGA 27
                                                                                                                                                                                                                                                                                                                                                                                                                       GCTAGCTACAACGA 16
                                                                                                                                    (bases 1 to 62)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     primer: -28M13 rev2 from Amersham
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  quality sequence stop: 1.
Location/Qualifiers
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/mol type="mRNA"
/db xref="GDB:3920316"
/db xref="taxon:9606"
/clone="IMAGE:530804"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Hori, N., Matoba, R., Niiyama, T.,
                                                                                                                                                                                                                                            GI:2148294
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Pred. No. 8.7e+04;
0; Mismatches 2;
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cell line. Homo
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                                                                                    of quantitative and
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AA499456
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JOURNAL
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Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     65 bp vi85g04.rl Stratagene mouse skin IMAGE:919062 5', mRNA sequence. AA4994KK
                                                                                                                                                                                                                                                                                                                                            Email: mouseest@watson.wustl.edu
This clone is available royalty-free through LLNL; contact the
IMAGE Consortium (info@image.llnl.gov) for further information.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1 (bases 1 to 65)
Marra,M., Hillier,L., Allen,M., Bowles,M., Dietrich,N., Dubun Marra,M., Kucaba,T., Lacy,M., Le,M., Martin,J., Morris,M., Schellenberg,K., Steptoe,M., Tan,F., Underwood,K., Moore,B., Theising,B., Wylie,T., Lennon,G., Soares,B., Wilson,R. and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1 RGGCTAGCTACAACGA 16
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1-3 Yamada-oka,Suita,Osaka 565,Japan.
                                                                                                                                                                                                                                                                                                                                                                                                                  Tel: 314 286 1800 Fax: 314 286 1810
                                                                                                                                                                                                                                                                                                                                                                                                                                                     Washington University School of MedicineP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Contact: Marra M/Mouse EST Project
WashU-HHMI Mouse EST Project
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mus musculus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AA499456
AA499456.1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         , Atsushi Fukushima, Yuko Kojima & Kenichi Matsubara
Institute for Molecular and Cellular Biology
                                                                                                                                                                                                                                                                                                              Seq primer: -28ml3 rev1 ET from
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The WashU-HHMI Mouse EST Project
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mus musculus (house mouse)
                                                                                                                                                                                                                                                                                                                                      MGI:531278
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/tissue_type="whole skin"
/dev_stage="11 weeks old"
/lab_host="SOLR (kanamycin resistant)"
/clome_lib="SOLR (kanamycin resistant)"
/clome_lib="Stratagene mouse skin (#937313)"
/clome_Tote="Organ: skin; Vector: pBluescript SK-, Site_1: EcoRI
/note="Organ: skin; Vector: pBluescript SK-, Site_1: EcoRI
/ Site_2: XhoI; Cloned uniddirectionally. Primer: Oligo
dT. Whole skin from 11 week old C57BL/6 female mice.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                /clone lib="Liver HepG2 cell line." 
/note=^{-3}'-directed regional cDNA library. Cleaved and transformed into E.coli." 
13 c 10 g 24 t
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/mol_type="mRNA"
/db_xref="GDB:DOS7595E"
                                                                                                                                                                                                        /mol_type="mRNA"
/strain="C57BL/6"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ocation/Qualifiers
                                                                                                                                                                    clone="IMAGE:919062"
                                                                                                                                                                                                                                                   organism="Mus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              db xref="taxon:9606"
                                                                                                                                              sex="females"
                                                                                                                                                                                         db_xref="taxon:10090"
                                                                                                                                                                                                                                                                                           ocation/Qualifiers
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lab_host="E.coli"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                GI:2234423
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75.0%;
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Pred. No. 8.7e+04;
                                                                                                                                                                                                                                                musculus"
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BASE COUNT

22

Best Local Matches

Query Match

RESULT 34 BH414369/c

DEFINITION

SOURCE KEYWORDS VERSION ACCESSION

ORGANISM

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19

REFERENCE AUTHORS TITLE

COMMENT

JOURNAL

FEATURES

source

linear

GSS 13-DEC-2000

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Ś
                                                     BASE COUNT
ORIGIN
                          Query Match
Best Local S
                  Matches
                  al Similarity
12; Conserv
  RGGCTAGCTACAACGA 16
                    Conservative
                             67.5%;
75.0%;
                             Score 10.8; DB 28
Pred. No. 8.9e+04;
                      Mismatches
                                        28;
                        Indels
                                        Length 65;
                         0
                          Gaps
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BH414369
BH414369.1
GSS.
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Zea mays
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; Liliopsida; Poales; Poaceae; PACCAD clade; Panicoideae; Andropogoneae; Zea.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  survey sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Stanford University
855 California Ave, Palo Alto, CA 94304, USA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Maize genomic sequences found using engineered RescueMu transposon
Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Possible ligation site of ends cut by 2 different endonucleases. Reverse complemented post-ligation sequence from source sequence. plate: 1007037 column: 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Department of Biological Sciences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Contact: Walbot V
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Email: walbot@stanford.edu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      GCTAGCTACAACGA 16
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                                                                                                                                                                       /clone_lib="1007 - RescueMu Grid H"
/clone="forgan: leaf; Vector: RescueMu (sngineered from
/note="forgan: leaf; Vector: RescueMu (sngineered from
/note="forgan: leaf; Vector: RescueMu (sngineered from
/note="forgan: leaf; Vector: RescueMu (sngineered from
/note: BglII;
pBlueScript backbone); Site 1: BamHI; Site 2: BglII;
pBlueScript backbone); Site 1 Manual from total genomic DNA.
designed to allow plasmid rescue from total genomic DNA.
designed to allow plasmid rescueMu, yo to the web
units. For more information on RescueMu, yo to the web
site 'www.zmbb.iastate.edu' and follow the links for
site 'www.zmbb.iastate.edu' and follow the links for
'RescueMu.' Grid H was grown at Berkeley in 2001. DNA
'RescueMu.' Grid H was grown at Berkeley in 2001. DNA
was extracted from leaf punches, double digested using
was extracted from leaf punches, double digested using
banHI and BglII, and ligated to form circular plasmids.
DH10B cells were transformed and then screened on LB
plates with ampicillin."

11 a 15 c 26 g 13 t
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/cultivar="mixed_background_W23/A188/B73"
/db_xref="taxon:4577"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              organism="Zea mays"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       dev_stage="adult"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 tissue_type="leaf"
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Pred. No. 8.9e+04;
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TA184A08Q/c
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BG447495/c
LOCUS
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TITLE
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AL473599
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Constructed at the Institute for Genomic Research (TIGR), Rockville, MD. Genomic DNA isolated from a cloned population of Rockville, MD. Genomic DNA isolated from a cloned population of Rockville, MD. Genomic DNA isolated from a cloned population of type a tight size distribution (to give a tight value) and use of the value of the contract of the value of the v
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Submitted (10-DEC-2000) Trypanosoma brucei genome sequencing project, Sanger Centre, The Wellcome Trust Genome Campus, Hinxton, Cambridge CB10 15A, E-mail: barrell@sanger.ac.uk and nhl@sanger.ac.uk
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Hall, N., Bowman, S., Chillingworth, C., O Melville, S.E., Raja
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Eukaryota; Euglenozoa; Kinetoplastida; Trypanosomatidae;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                SSD
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               63 GGGCCAGTTACAACAA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Email: nelsayed@tigr.org
Details of T. brucei sequencing at the Sanger Centre are available
at http://www.sanger.cuk/Projects/T_brucei/.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Trypanosoma.
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EST000018 Rat Liver Express Library
liver000018, mRNA sequence.
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GGCCAAGGTACAACGA
1 (bases 1 to 66) Li,y.C., Xu,C.S. and Zh,y.H. Cloning the specific expressed genes in partial hepatectomy rat liver by suppression subtractive hybridization
                                                                                                                                                   Rattus norvegicus
Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae;
                                                                                                                                                                                                                                                                                                           BG447495.1 GI:13357147
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                                                                                                                                                                                                                                               Rattus norvegicus (Norway rat)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /organism="Trypanosoma brucei"
/mol_type="genomic DNA"
/strain="TRBU927"
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/clone="184a08"
11 c 11 g
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C., Ormond,D., Harris,B., El-Sayed,N., Hou,L.,
Rajandream,M.A. and Barrell,B.G.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            67.5%;
75.0%;
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pred. No. 8.9e+04;
1; Mismatches 3
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28

DB 29;

Length Indels

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Gaps

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mRNA linear ESI 13-114A-74 Rattus norvegicus cDNA clone

linear

EST 15-MAR-2001

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JOURNAL COMMENT
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AA771119/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1 RGGCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                                                                                                           Contact: Marra M/Mouse EST Project
WashU-HHMI Mouse EST Project
Washington University School of MedicineP
4444 Forest Park Parkway, Box 8501, St. Lo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1 (bases 1 to 67)
Marra, M., Hillier, L., Allen, M., Bowles, M., Dietrich, N., Dubuo Geisel, S., Kucaba, T., Lacy, M., Le, M., Martin, J., Morris, M., Schellenberg, K., Steptoe, M., Tan, F., Underwood, K., Moore, B., Theising, B., Wylie, T., Lennon, G., Soares, B., Wilson, R. and Waterston, R.
                                                                                                                                                       Trace considered overall poor quality
Possible reversed clone: similarity on wrong strand
Seq primer: -28ml3 rev2 ET from Amersham
High quality sequence stop: 1.
                                                                                                                                                                                                                                                        Email: mouseest@watson.wustl.edu
This clone is available royalty-free through LLNL; contact the
IMAGE Consortium (info@image.llnl.gov) for further information.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  vt16h01.rl Barstead mouse myotubes MPIRB5 Mus musculus cDNA clor INAGE:1163281 5' similar to SW:ATP6_MOUSE P00848 ATP SYNTHASE A
                                                                                                                                                                                                                                                                                                                                                                                                                                             Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                The WashU-HHMI Mouse EST Project
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Email: lychang@mail.henannu.edu.cn
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Henan Normal University
Jianshe road, Xinxiang, China
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Department of Biology
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                                                                                                                                                                                                                                         MGI:629193
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mus musculus (house mouse)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Similarity
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314 286 1810
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  /tissue_type="liver"
/dev_stage="embryonic day 17 post-fertilization"
/clone_lib="Rat Liver Express Library"
/ 17 c 15 g 16 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        /mol_type="mRNA"
/strain="Sprague-Dawley"
/db_xref="taxon:10116"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Location/Qualifiers
/clone="IMAGE:1163281"
/cell_line="C2C12"
                                                                                                                                      Socation/Qualifiers
                                       db_xref="taxon:10090"
                                                        mol_type="mRNA"
strain="C3H"
                                                                                                organism="Mus musculus"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  sex="male"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   clone="liver000018"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                organism="Rattus norvegicus"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          . 66
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Pred. No. 8.9e+04;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Dubuque, T.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Gaps
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REFERENCE
AUTHORS
TITLE
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DEFINITION
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CB366166
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VERSION
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                                                                                                                                                                                                                                                                                                                                                                                                                                      Unpublement Y
Contact: Ruan Y
Laboratory of Molecular Biotechnology
Genome Institute of Singapore
Genome Institute of Capricorn #05-01,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ; Cyprinidae; Danio.
1 (bases 1 to 67)
Mathavan, S. Wei, C., Thoreau, H., Chia, J.M.
Genome Institute of Singapore, Zebrafish E
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            CB366166
2F001-000049-DPE-F2-D F10 GISZF001 Danio rerio cDNA clone
IMAGE:6910149 5' similar to fp15a03.yl zebrafish gridded kidney
Danio rerio cDNA clone IMAGE:4729612 5' similar to WP:CE25522
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   w
                                                                                                                                                                                                                                                                                                                                                                           Email: gisry@nus.edu.sg
GIS Clone ID: ZF001-P00049-PP_L20
                                                                                                                                                                                                                                                                                                                                                                                                                  Tel: +65 6827 5200 Fax: +65 6827 5201
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Eukaryota; Metazoa; Chordata; Craniata; Actinopterygii; Neopterygii; Teleostei;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             EST
                                                                                                                                                                                                                                                                                                             Plate: ZF001-P00049-DPE-F2-D
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Danio rerio
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Danio rerio (zebrafish)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            CB366166.1 GI:29016477
                                                                                                                                                                                                                                                                                                                                BACKWARD: M13
                                                                                                                                                                                                                                                                                                                                                              PCR PRimers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Y61A9LA.E, mRNA sequence.
                                                                                                                                                                                                                                                                                                                                                FORWARD: M13
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                                                                                                                                                                                                                                                         primer: CCGCATAACTTGTATAGCA quality sequence stop: 67.
Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   /clone lib="GISZF001"
/note="Vector: pDNR-LIB; Site_1: Sfi A (GGCCATTACGGCC);
/note="Vector: pDNR-LIB; Site_1: Sfi A (GGCCATTACGGCC);
Site_2: Sfi B (GGCCGCCTGGCC);
Primed ; Priming sequence: 5.ATTCTAGA GGCCGAGCCGGCC
GACATG(T)30VN; Directionally cloned,
Sfi A site GGCCATTACGGCC; 5' linker/adaptor sequence:
                                                                                                       /db_xref="taxon:7955"
/clone="MAGE:6910149"
/tissue_type="Embryo"
/tissue_type="Embryo"
/dev stage="7 Different embryonic Stages( From just fertIlized Embryos to 72 hours just hatched baby fish)"
/lab_host="DH10B"
                                                                                                                                                                                                           /organism="Danio rerio"
/mol_type="mRNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       67.5%;
85.7%;
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Pred. No. 9e+04;
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Ostariophysi; Cypriniform
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        M. and Ruan, Y.
EST Collection
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 67
                                                                                                                                                                                                                                                                                                                                                                                                                                                    Singapore 117528
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BASE COUNT ORIGIN

19

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Singapore" 19 c

14 g

15 t

Length

67;

site GGCCGCCTCGGCC; 3' linker/adaptor sequence: same as the priming sequence; Average insert size: 2kb; For pCR insert analysis: Use M13 Forward and reverse primers; Library Amplified Recombinants (inserts): 98%; Library complexity: 5x106; Full-length construction (method): SMART, a Clontech method; Library constructed by: S. SMART, Chia-Lin Wei, and Yijun Ruan Genome Institute of Mathavan, Chia-Lin Wei, and Yijun Ruan Genome Institute of

.AAGCAGTGGTATCAACGCAGAGTGGCC; ite GGCCGCCTCGGCC; 3' lin

3' cloning site: Sfi B

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ACCESSION
VERSION
KEYWORDS
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D11778/c
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              RESULT 40
AW104004
LOCUS
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ORIGIN
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DEFINITION
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Matches
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                                                                                                                                                                         Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          mRNA sequence.
D11778
D11778.1 GI:21
EST.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     D11778 69 bp mRNA linear EST 02-DEC-1992 HUMHM01E11 Liver HepG2 cell line. Homo sapiens cDNA clone hm01e11,
                                                                                             20
                                                                                                                                                                                                                                                                                                                                                                                                                                                     Contact: Kousaku Okubo, Naohiro Hori, Ryo Matoba, Toshiyuki Niiyama
, Atsushi Fukushima, Yuko Kojima & Kenichi Matsubara
Institute for Molecular and Cellular Biology
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Large scale cDNA sequencing for analysis of quantitative and qualitative aspects of gene expression Nat. Genet. 2, 173-179 (1992)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1 (bases 1 to 69)
Okubo, K., Hori, N., Matoba, R., Niiyama, T.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Bukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  and Matsubara, K.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens (human)
AW104004 71 bp mRNA linear EST 20-OCT-1999 xd63h05.xl NCI_CGAP_Ov23 Homo sapiens cDNA clone IMAGE:2598489 3',
                                                                                                                   1 RGGCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                          Osaka University
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1345164
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                                                                                                                                                          Conservative
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                                                                                                                                                                                                                                   /clone lib="Liver HepG2 cell line."
/note="3'-directed regional cDNA library. Cleaved by MboI
and transformed into B.coli."
14 c 8 g 23 t
                                                                                                                                                                                                                                                                                                                                                                           organism="Homo sapiens"
                                                                                                                                                                                                                                                                                                                                  /db_xref="GDB:D0S8324E"
/db_xref="taxon:9606"
                                                                                                                                                                                                                                                                                                                                                                                                          ocation/Qualifiers
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75.0%;
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                                                                                                                                                                                                                                                                                                 host="E.coli"
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Pred. No. 9e+04;
                                                                                                                                                          Score 10.8; DB 14; pred. No. 9.1e+04; 1; Mismatches 3;
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Job time : 1448 secs

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KEYWORDS
SOURCE
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AUTHORS
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Search completed: January 21, 2004, 08:16:07
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Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               source
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            cDNA Library Preparation: Life Technologies, Inc.
cDNA Library Arrayed by: Greg Lennon, Ph.D.
DNA Sequencing by: Washington University Genome Sequencing Center
Clone distribution: NCI-CGAP clone distribution information can be
found through the I.M.A.G.E. Consortium/LLNL at:
www-bio.llnl.gov/bbrp/image/image.html
Seq primer: -40UP from Gibco.
Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Bukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
1 (bases 1 to 71)
NCI-CGAP http://www.ncbi.nlm.nih.gov/ncicgap.
National Cancer Institute, Cancer Genome Anatomy Project (CGAP),
                                                                 47
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Homo sapiens (human)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Email: cgapbs-r@mail.nih.gov
Tissue Procurement: Christopl
Emmert-Buck, M.D., Ph.D.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Contact: Robert Strausberg, Ph.D
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Tumor Gene Index
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         nRNA sequence
                                                                                                     1 RGGCTAGCTACAACGA 16
                                                                                                                                                                    Similarity
                                                                 AGGATGGCTACAAAGA
                                                                                                                                              67.5%;
nilarity 75.0%;
Conservative 1
                                                                                                                                                                                                                                                        24
                                                                                                                                                                                                                                                 /clone lib="NCI_CGAP_Ov23"
/rote="Organ: ovary; Vector: pCMV-SPORT6; Site_1: Sall;
/rote="Organ: ovary; Vector: pCMV-SPORT6; Site_1: Oligo dT
Site_2: NotI; Cloned unidirectionally. Primer: Oligo dT
Average insert size 1.35 kb. Tumor types include: mixed
Mullerian tumor, papillary serous, clear cell, spindle
cell. All are primary tumors, metastasis positive. Life
Technologies catalog #: 11534-013"
a 8 c 14 g 25 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         /mol_type= """:9606"
/db_xref="taxon:9606"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              organism="Homo sapiens"
                                                                                                                                                                                                                                                                                                                                                                                                                           'lab host="DH108"
                                                                                                                                                                                                                                                                                                                                                                                                                                      clone="IMAGE:2598489"
tissue_type="tumor, 5 pooled (see description)"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          _type="mRNA"
                                                                      62
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Christopher Moskaluk, M.D.,
                                                                                                                                                     Score 10.8; DB 9;
Pred. No. 9.2e+04;
1; Mismatches 3
                                                                                                                                                                                                   DB 9;
                                                                                                                                                                                                   Length 71;
                                                                                                                                                            Indels
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Sequence 7, Appli Sequence 55, Appl Sequence 11, Appl Sequence 12, Appl Sequence 17, Appl Sequence 17, Appl Sequence 18, Appl Sequence 169, Appl Sequence 175, Appl	3 8 7 7 4 2 4 5	81658695	11116 150	Sequence 18, Appl Sequence 25, Appl Sequence 52, Appl Sequence 52, Appl Sequence 52, Appl Sequence 52, Appl Sequence 26, App Sequence 226, App Sequence 276, App Sequence 276, App Sequence 45, Appl Sequence 27, Appl	Sequence 13, Appl Sequence 9, Appli Sequence 9, Appli Sequence 10, Appl Sequence 39, Appli Sequence 39, Appli Sequence 39, Appli Sequence 18, Appl Sequence 18, Appl Sequence 21, Appl Sequence 31, Appl Sequence 12, Appl Sequence 13, Appl Sequence 12, Appl Sequence 12, Appl Sequence 33, Appl Sequence 37, Appl Sequence 16, Appl Sequence 16, Appl Sequence 17, Appl Sequence 18, Appl Sequence 11, Appl
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GENERAL INFORMATION:
APPLICANT: Rossi, John J.
APPLICANT: Scherr, Michaela
APPLICANT: Riggs, Arthur D.
TITLE OF INVENTION: Method for Identifying Accessible Binding Sites
FILE REFERENCE: 1954-285
CURRENT APPLICATION NUMBER: US/09/536,393
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Patent No. 6562570
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Best Local Similarity
Matches 14; Conserv
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SOFTWARE: PatentIn Ver. 2.1
SEQ ID NO 19
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CURRENT FILING DATE: 2000-03-28
EARLIER APPLICATION NUMBER: 60/127,529
EARLIER FILING DATE: 1999-04-02
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               APPLICANT: Rossi, John J.
APPLICANT: Scherr, Michaela
APPLICANT: Riggs, Archur D.
TITLE OF INVENTION: Method for Identifying Accessible Binding Sites on RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      LENGTH: 16
TYPE: DNA
ORGANISM: Artificial Sequence
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o. 6562570
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US-08-472-255A-161
US-08-479-724A-140
US-08-479-724A-161
US-08-479-724A-161
US-08-472-256B-140
US-08-472-256B-160
US-08-472-256B-161
US-08-472-256B-161
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US-08-952-793-140
US-08-952-793-160
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Pred. No. 7
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US-08-687-421-282
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Sequence 25, Application US/09270140A
Patent No. 6361941
GENERAL INFORMATION:
APPLICANT: Todd, Alison
APPLICANT: Todd, Alison
APPLICANT: Todd, Murray
TITLE OF INVENTION: Catallytic Nucleic Acid bas
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
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US-09-270-140A-23
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APPLICANT: Every, Caroline
APPLICANT: Every, Caroline
APPLICANT: Cairns, Murray-
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&C1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
SEQ ID NO 23
LENGTH: 29
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SEQ ID NO 20
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EARLIER APPLICATION NUMBER: 60/127,529
EARLIER FILING DATE: 1999-04-02
NUMBER OF SEQ ID NOS: 31
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TYPE: DNA
ORGANISM: Artificial Sequence ,
FEATURE:
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ORGANISM: Artificial Sequence
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Pred. No. 7
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Pred. No. 7
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US-09-270-140A-55
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LENGTH: 29
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SEQ ID NO 55
                  SEQ ID NO 5
LENGTH: 31
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APPLICANT: Fuery, Caroline
APPLICANT: Gairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION UMMBER: 60/079,651
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                                                  TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related TITLE OF INVENTION: Molecules And Kits FILE OF INVENTION: Molecules And Kits FILE REFERENCE: JJ1770SequenceListing CURRENT APPLICATION NUMBER: US/09/253,955

CURRENT FILING DATE: 1999-02-22

EARLIER APPLICATION NUMBER: 60/076,899

EARLIER APPLING DATE: 1998-03-05

NUMBER OF SEQ ID NOS: 11

SOFTWARE: Patentin Ver. 2.0
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                                                                                                                                                                                                                               APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
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NUMBER OF SEQ ID NOS: 96
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TYPE: DNA
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TYPE: DNA
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TYPE: DNA
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o. 6361941
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87.5%;
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; ORGANISM: synthetic construct US-09-253-955-5
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US-09-637-405-5
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                                                              FEATURE:

OTHER INFORMATION: Description of Artificial Sequence: DNAzyme
OTHER INFORMATION: codon 542 - Cystic Fibrosis
US-09-270-140A-42
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US-09-637-405-5
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SEQ ID NO 42
LENGTH: 31
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Patent No. 620111
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Best Local
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Best Local Similarity
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                                                                                                                                                                                                       FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
                                                                                                                                                                                                                                                                                              APPLICANT: Todd, Alison
APPLICANT: Puery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid
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APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
                                                                                                            TYPE: DNA
ORGANISM: Artificial Sequence
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Pred. No. 7
                  Score 14.8;
Pred. No. 7.
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Pred. No. 7
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US-09-270-140A-45
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US-09-270-140A-48
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PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
SEQ ID NO 45
LENGTH: 31
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GENERAL INFORMATION:
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LENGTH: 31
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Best Local
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CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
                                                                                                                                                                                                                                                                       FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
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TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Mur
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
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                                                                                                                                                                                                        ORGANISM: Artificial Sequence
                                                                                                                                                                                                                            TYPE: DNA
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   GGGCTAGCTACAACGA 24
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87.5%; Pred. No. 7.
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Pred. No. 7.9;
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RESULT 13 US-09-270-140A-12

Sequence 12, Application US/09270140A Patent No. 6361941 GENERAL INFORMATION:

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US-09-746-985B-5
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                                                                                                                                  OTHER INFORMATION: PCR primer US-09-746-9858-5
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CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
SEQ ID NO 51
LENGTH: 31
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SOFTWARE: PATENTIN VET. 2.0
SEQ ID NO 5
LENGTH: 31
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APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
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Best Local
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APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
                                                                                                                                                                                                                                                                                                                       FILE REFERENCE: SequenceListing
CURRENT APPLICATION NUMBER: US/09/746,985B
CURRENT FILING DATE: 2000-12-21
                                                                                                                                                                                                                                                                                                                                                                       APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods,
TITLE OF INVENTION: Molecules And Kits
                                                                                                                                                                                                                                                                                   PRIOR APPLICATION NUMBER: 60/076,899 PRIOR FILING DATE: 1998-03-05
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RESULT 15
US-09-270-140A-19
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US-09-270-140A-15
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                                                                            Sequence 19, Application US/09270140A Patent No. 6361941
GENERAL INFORMATION:
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APPLICANT: Todd, Alison
APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
TILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
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SEQ ID NO 12
LENGTH: 32
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NUMBER OF SEQ ID NOS: 96
SOFTWARE: PatentIn Ver. 2.1
SEQ ID NO 15
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Best Local Similarity
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Patent No. 6361941
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TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
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Local Similarity 87.5%;
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Pred. No. 8;
2; Mismatches
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Pred. No. 8;
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GENERAL INFORMATION:

APPLICANT: Todd, Alison

APPLICANT: Todd, Alison

APPLICANT: Todd, Alison

APPLICANT: Todd, Alison

APPLICANT: Cairns, Murray

ITILE OF INVENTION: Catalytic Nucleic Acid base Dia

FILE REFERENCE: J6J1799

CURRENT APPLICATION NUMBER: US/09/270,140A

CURRENT FILING DATE: 1999-03-16

PRIOR APPLICATION NUMBER: 60/079,651

PRIOR APPLICATION DATE: 1998-03-27

NUMBER OF SEQ ID NOS: 96
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US-09-270-140A-58
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SEQ ID NO 28
LENGTH: 32
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LENGTH: 32
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Best Local Similarity
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PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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APPLICANT: Fuery, Caroline
APPLICANT: Cairins, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REPERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
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CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
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SOFTWARE: PatentIn Ver. :
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ORGANISM: Artificial Sequence
FEATURE:
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11 AGGCTAGCTACAACGA 26
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Pred. No. 8;
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Pred. No. 8;
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RESULT 19
US-09-270-140A-53
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US-09-270-140A-9
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Patent No. 6361941
                                                                 SEQ ID NO 53
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Best Local Similarity
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Patent No. 6361941
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LENGTH: 32
                                                                                  APPLICANT: Fuery, Caroline
APPLICANT: Cairins, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
FULCATION NUMBER: US/09/270,140A
CURRENT FAPPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
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APPLICANT: Todd, Alison
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CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
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SOFTWARE: PatentIn Ver. 2.1
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
             TYPE: DNA
ORGANISM: Artificial Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     OTHER INFORMATION: Description of Artificial Sequence: DNAzyme for OTHER INFORMATION: k-ras codon 13 mutant RNA
FEATURE:
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                                                ENGTH: 34
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Pred. No. 8;
2; Mismatches
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Pred. No. 8;
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; OTHER INFORMATION: Description of Artificial Sequence:DNAzyme US-09-270-140A-6
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Best Local S
Matches 15
                                                                                                                                                                SEQ ID NO 6
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LENGTH: 35
TYPE: DNA
ORGANISM: Artificial Sequence
Query Match
Best Local Similarity
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR PILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
NUMBER OF SEQ ID NOS: 96
SOPTWARE: Patentin Ver. 2.1
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Muri
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Mur
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                                                                                                        ORGANISM: Artificial Sequence
                                                                                                                            TYPE: DNA
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Pred. No. 8;
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Pred. No. 8;
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No. 8;
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US-09-270-140A-31
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Best Local :
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SEQ ID NO 31
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: JEAL199
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
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TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J199
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
CURRENT FILING DATE: 1999-03-16
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PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Mur
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PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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                                                                                                                                            FEATURE:
OTHER INFORMATION:
OTHER INFORMATION:
                                                                                                                                                                                          LENGTH: 35
TYPE: DNA
ORGANISM: Artificial Sequence
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ORGANISM: Artificial Sequence
PEATURE:
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AGGCTAGCTACAACGA 23
                              RGGCTAGCHACAACGA 16
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                                                                 Conservative
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                                                                                                                                               Description of Artificial Sequence: DNAzyme for codon 74
                                                                              92.5%;
87.5%;
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87.5%; Pred. No. 8;
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; OTHER INFORMATION: Description of Artificial Sequence:DNAzyme for OTHER INFORMATION: codon 215 - mutant US-09-270-140A-36
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US-09-270-140A-34
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US-09-270-140A-36
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PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: PATENTIN VEY: 2.1
SEQ ID NO 34
LENGTH: 38
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Best Local Similarity
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SEQ ID NO 36
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Best Local Similarity 87.5%;
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APPLICANT: Fuery, Caroline
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
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CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
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GGGCTAGCTACAACGA 25
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Pred. No. 8.1;
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RESULT 26 US-09-270-140A-91

Sequence

91, Application US/09270140A

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              Sequence 85, Application US/08849567A
PATENT NO. 6326174
GENERAL INFORMATION:
APPLICANT: Joyce, Gerald F.
APPLICANT: Breaker, Ronald R.
TITLE OF INVENTION: ENEXYMATIC DNA MOLECULES
FILE REFERENCE: SCR1943S
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SEQ ID NO 94
LENGTH: 39
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Best Local Similarity
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CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
CURRENT APPLICATION NUMBER: US/08/849,567A
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Mur
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                                                                                                                                                                                                                                                                                                                                                                                                                    TYPE: DNA
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Pred. No. 8
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Pred. No. 8
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US-08-849-567A-87
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SEQ ID NO 85
LENGTH: 47
TYPE: DNA
                                                 Sequence 81, Application US/08849567A Patent No. 6326174 GENERAL INFORMATION:
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Best Local
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APPLICANT: Joyce, Gerald F.
APPLICANT: Breaker, Ronald R.
TITLE OF INVENTION: ENZYMATIC DNA MOLECULES
                 APPLICANT:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   APPLICANT: Joyce, Gerald F.
APPLICANT: Breaker, Ronald R.
TITLE OF INVENTION: ENZYMATIC DNA MOLECULES
FILE REFERENCE: SCR1943S
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PRIOR FILING DATE: 1994-1
NUMBER OF SEQ ID NOS: 101
SOFTWARE: Patentin Ver. 2
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PRIOR FILING DATE: 1995-12-01
PRIOR APPLICATION NUMBER: 08/472,194
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PRIOR FILING DATE: 1995-12-01
PRIOR APPLICATION NUMBER: 08/472,194
PRIOR FILING DATE: 1995-06-07
PRIOR PPLICATION NUMBER: 08/349,023
PRIOR FILING DATE: 1994-12-02
PRIOR FILING DATE: 1994-12-02
PRIOR FILING DATE: 1994-12-02
PRIOR FILING DATE: 1994-11-02
                                                                                                                                                                                                                                                                                                                                     TYPE: DNA
ORGANISM: Artificial Sequence
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Pred. No. 8
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Pred. No. 8.3;
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CURRENT APPLICATION NUMBER: US/08/849,567A CURRENT FILING DATE: 1997-08-25

SCR1943S

FILE REFERENCE:

PRIOR APPLICATION NUMBER: PRIOR FILING DATE: 1995-1

1995-12-01

PCT/US95/15580

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EARLIER FILING DATE: 1998-03-05;
NUMBER OF SEQ ID NOS: 11
SOFTWARE: PatentIn Ver. 2.0;
SEQ ID NO 8;
LENGTH: 50
TYPE: DNA
ORGANISM: synthetic construct
US-09-253-955-8
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Patent No. 6140055
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Sequence 8, Application US/09637405
Patent No. 6201113
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TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, TITLE OF INVENTION: Molecules And Kits FILE REFERENCE: JJ1770SequenceListing CURRENT APPLICATION NUMBER: US/09/637,405 CURRENT FILING DATE: 2000-08-11 EARLIER APPLICATION NUMBER: 09/253,955 EARLIER FILING DATE: 1999-02-22
                                                                                                                                                                      ENERAL INFORMATION:
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                                                                                                                     APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
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APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods,
TITLE OF INVENTION: Molecules and Kits
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                                                                                                                                                     APPLICANT: Todd, Alison V
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TYPE: DNA
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Pred. No. 8.3;
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Mismatches
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SOFTWARE: PatentIn Ver. 2.0
SEQ ID NO 8
                                                 SOFTWARE:
SEQ ID NO 86
                                                                                                                                                                                                                                                                    GENERAL INFORMATION:
APPLICANT: Joyce, Gerald F.
APPLICANT: Breaker, Ronald R.
APPLICANT: Breaker RONAIT DNA MOLECULES
TITLE OF INVENTION: ENZYMATIC DNA MOLECULES
                                                                                                                                                                                                                                                                                                                                          Sequence 86, Application US/08849567A Patent No. 6326174
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APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
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Best Local Similarity
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                                                                                                                                       CURRENT APPLICATION NUMBER: US/08/849,567A CURRENT FILING DATE: 1997-08-25 PRIOR APPLICATION NUMBER: PCT/US95/15580 PRIOR FILING DATE: 1995-12-01 PRIOR APPLICATION NUMBER: 08/472,194 PRIOR FILING DATE: 1995-06-07 PRIOR FILING DATE: 1995-06-07
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                                                                                                       PRIOR APPLICATION NUMBER: 08/
PRIOR FILING DATE: 1994-12-02
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                                                                                                                                                                                                                                                     FILE REFERENCE:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
ORGANISM: Artificial Sequence
                                LENGTH: 51
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OTHER INFORMATION: Description of Artificial Sequence:
US-08-849-567A-86
                                                                                                             ; TYPE: DNA; ORGANISM: synthetic construct US-09-637-405-2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           US-09-637-405-2/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ; TYPE: DNA; ORGANISM: synthetic construct US-09-253-955-2
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APPLICANT: Todd, Alison V
APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Calins, Murray J
TITLE OF INVENTION: Molecules and Kits
FILE OF INVENTION: Molecules and Kits
FILE REFERENCE: JJ1770SequenceListing
CURRENT APPLICATION NUMBER: US/09/637,405
CURRENT FILING DATE: 2000-08-11
EARLIER APPLICATION NUMBER: 09/253,955
EARLIER FILING DATE: 1999-02-22
NUMBER OF SEQ ID NOS: 11
                                                                                                                                                                                          SOFTWARE: PatentIn Ver. 2.0 SEQ ID NO 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        SOFTWARE: PatentIn Ver. 2.0
SEQ ID NO 2
LENGTH: 59
                                                    Query Match
Best Local Similarity
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Patent No. 6201113
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APPLICANT: Fuery, Caroline J
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
TITLE OF INVENTION: Molecules And Kits
FILE REPERBUCE: J11770SequenceListing
CURRENT APPLICATION NUMBER: US/09/253,955
CURRENT FILING DATE: 1999-02-22
EARLIER FILING DATE: 1998-03-05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          sequence 2, Application US/09253955
Patent No. 6140055
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87.5%; Pred. No. 8
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US-09-253-955-10/c
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SEQ ID NO 10
LENGTH: 60
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APPLICANT: Todd, Alison V
APPLICANT: Puery, Caroline J
APPLICANT: Cairns, Murray J
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SOFTWARE: PatentIn Ver. 2.0
SEQ ID NO 2
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                                                                                        Query Match
Best Local Similarity
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APPLICANT: Fuery, Caroline J
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
TITLE OF INVENTION: Molecules And Kits
TILE REFERENCE: SequenceListing
CURRENT FILING DATE: 2000-12-21
PRIOR APPLICATION NUMBER: 60/076,899
PRIOR APPLICATION NUMBER: 60/076,899
PRIOR FILING DATE: 1998-03-05
PRIOR FILING DATE: 1998-03-05
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                                                                                                                                                                                   TYPE: DNA
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ORGANISM: Artificial Sequence
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RESULT 39 US-09-637-405-10/c

Sequence 10, Application US/09637405

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GENERAL INFORMATION:
GENERAL INFORMATION:
APPLICANT: Todd, Alison
APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
SEQ ID NO 95
LEMOTH: 60
TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
OTHER INFORMATION: Description of Artificial Sequence:3" zymogene
OTHER INFORMATION: primer eK42Dz2
US-09-270-140A-95
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TITLE OF INVENTION: Molecules And Kits
FILE REFERENCE: JJ1770SequenceListing
CURRENT APPLICATION NUMBER: US/09/637,405
CURRENT FILING DATE: 2000-08-11
FARLIER APPLICATION NUMBER: 09/253,955
EARLIER FILING DATE: 1999-02-22
NUMBER: OP SEQ ID NOS: 11
SOFTWARE: Patentin Ver. 2.0
SEQ ID NO 10
LENGTH: 60
TYPE: DNA
RCANISM: synthetic construct
US-09-637-405-10
Search completed: January 21, 2004, 08:17:14 Job time : 47 secs
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US-09-270-140A-95/c
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APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
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INFORMATION:
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 Published Applications NA:*
L: /cgn2_6/ptodata/1/pubpna
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gn2 6/ptodata/1/pubpna/US06_NEW PUB.seq:*
gn2 6/ptodata/1/pubpna/US06_PUBCOMB.seq:*
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	14.8 92.5 14.8 92.5	14.8 92.5	14.8 92.5 14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.6 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.0 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.0 92.5	14.80 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.0 92.5	14 8 93 5	14.8 92 5	14 8 92.5	14 8 92.5	14 8 92.5	14.0 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14 8 93 5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92 5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	14.8 92.5	
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	14.8 92.5 31 10 US-09-864-785 14.8 92.5 31 10 US-09-864-785 14.8 92.5 31 10 US-09-864-785	14.8 92.5 31 10 US-09-864-785	14.8 92.5 31 10 US-09-864-785 14.8 92.5 31 10 US-09-864-785	14.8 92.5 31 10 US-09-864-785	14.8 92.5 31 10 US-09-864-785	14.8 92.5 31 10 US-09-864-785	14.8 92.5 31 10 US-09-864-789	14.8 92.5 31 10 US-09-864-78	14.8 92.5 31 10 US-U9-864-789	14.8 92.5 31 10 US-09-864-78	14.8 92.5 31 10 US-09-864-78	14.8 92.5 31 10 US-U9-864-78	14.8 92.5 31 10 US-09-864-78	14 8 92 5 31 10 US-09-864-78	14.8 92.5 31 10 US-09-864:78	14.8 92.5 31 10 US-09-864-78	14.8 92.5 31 10 US-09-864-78	14.6 00 5 31 10 US-09-864-78	14.8 92 5 11 10 03-054-78	14.8 92.5 31 10 IIG_00_964_76	14.8 92.5 31 10 HS_00_964_76	14.8 92.5 31 10 175-00-064-76	14.8 92.5 31 10 115-09-964-76	14.8 92.5 31 10 115-09-864-78	14.8 92.5 31 10 IIS-09-864-79	14.8 92.5 31 10 115-06-964-71	14.8 92.5 31 10 175-09	14.8 92.5 31 10 119-09	14.8 92.5 31 10 US-09	14.8 92.5 31 10 US-09	14.8 92.5 31 10 US-09	14.8 92.5 31 10 US-09	14.6 92.5 31 9 US-09-	14 8 93 5 31 6 75 08-16	14.8 92 5 20 15 05-10	14 8 92 5 30 15 US-10	14 8 92 5 30 15 WS-10	14 8 92 5 30 15 US-10	14 8 92 5 30 15 US-10	14.8 92.5 30 15 US-10	14.8 92.5 30 15 US-1	14.8 92.5 30 15 US-1	14.8 92.5 30 15 US-1	14.8 92.5 30 15 IIS-1	14.8 92.5 30 15 US-1	14 8 92 5 20 15 110 1	14.8 92 5 30 15 WS-0	14.8 92.5 30 13 16.0	14.8 92.5 30 13 115-0	14.8 92.5 30 13 13.00	14.8 92.5 20 13 16.0	14.8 92.5 30 13 HE 0	14.8 92.5 30 13 176.0	14.8 92.5 30 13 115-0	14.8 92.5 30 13 115-0	14.8 92.5 30 13 He-n	14.8 92.5 30 13 115-0	14.8 92.5 30 13 US-0										
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14.8 92.5 31 11 US-09-730-289B-3169 Sequence 3 14.8 92.5 31 11 US-09-730-289B-3170 Sequence 3	. 14.8 92.5 31 11 US-09-730-289B-3168 Sequence 2	14.8 92.5 31 11 US-09-730-289B-3166 Sequence :	14.8 92.5 31 11 US-09-730-289B-3165 Sequence	14.8 92.5 31 11 US-09-730-289B-3164 Sequence	14.8 92.5 31 11 US-09-730-289B-3163 Sequence	14.8 92.5 31 11 US-09-730-289B-3162 Sequence	14.8 92.5 31 11 US-09-730-289B-3161 Sequence 3	14.8 92.5 31 11 US-09-730-289B-3160 Sequence 3	14.8 92.5 31 11 US-09-730-289B-3159 Sequence 3	14.8 92.5 31 11 US-09-730-289B-3158 Sequence 3	14.8 92.5 31 11 US-09-730-289B-3157 Sequence	14.8 92.5 31 11 US-09-730-289B-3156 Sequence	14.8 92.5 31 11 US-09-730-289B-3155 Sequence	14.8 92.5 31 11 US-09-/30-289B-3154 sequence	14.8 92.5 31 11 US-09-730-2898-3153 Sequence	THE OPEN SET IN THE COUNTY STATE OF THE CONTROL OF THE CONTROL OF THE COUNTY STATE OF	14.0 ON TO 11 11 110 ON TO	1/ 0 00 5 01 11 IVS_00_730_0000_3151 00000000000000000000000000000000000	14 8 92 5 31 11 13:-09-730-2898-3150 Semience	14.8 92.5 31 11 US-09-730-289B-3149 Sequence	14.8 92.5 31 11 US-09-730-289B-3148 Sequence 3	14.8 92.5 31 11 US-09-730-289B-3147 Sequence	THE COUNTY OF TH	14 8 92 5 31 11 US-09-730-289B-3146 Semience	14.8 92.5 31 11 US-09-730-289B-3145 Sequence	14.8 92.5 31 11 US-09-730-289B-3144 Sequence	THE COUNTY OF TH	14 8 92 5 31 11 US-09-730-289B-3143 Sequence	14.8 92.5 31 11 US-09-730-289B-3142 Sequence	THE COURT OF THE PROPERTY OF T	14.8 92.5 31 11 US-09-730-289B-3141 Sequence	14.8 92.5 31 11 US-09-730-289B-3140 Sequence	THE OWNER OF THE TOTAL CONTROL OF THE OWNER OWNER OWNER OF THE OWNER O	14 8 02 5 31 11 IIS-09-730-289R-3139 Segmence	14.8 92.5 31 11 US-09-730-289B-3138 Sequence 3	THIS OF THE COUNTY TO THE COUN	14 8 92 5 31 11 IIS-09-730-2898-3137 Semience 3	14.8 92.5 31 11 US-09-730-289B-3136 Sequence 3	14.8 92.5 31 11 US-09-730-289B-3135 Sequence 3	14.0 O. 17. 17. 17. 17. 17. 17. 17. 17. 17. 17	14 B 92 S 31 11 HS-09-730-289R-3134 Segmence 3	14.8 92.5 31 11 US-09-730-2898-3133 Sequence 3	14 0 00 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	14.8 92.5 31 11 US-09-730-289B-3132 Sequence 3	14.8 32.5 SI II US-U9-730-288B-3ISI Sequence :	THE COURT OF THE C	14 B 82 S 31 11 IIS-08-730-289B-3130 Semience	14.8 92.5 31 11 US-09-730-289B-3129 Sequence	14.8 92.5 31 11 US-09-730-289B-3128 Sequence	THE COURT OF THE C	14.8 92.5 31 11 HS-09-730-2898-3127 Segmence	14.8 92.5 31 11 US-09-730-289B-3126 Sequence	14.8 92.5 31 11 US-09-730-289B-3125 Sequence 3	14.8 92.5 31 11 US-09-730-289B-3124 Sequence	14.8 92.5 31 11 US-09-730-2025-3123 Sequence	THE OWNER OF THE CONTRACT OF T	1/ 0 03 5 31 11 11C-00-730 -2008-3123 Segment 3	14.8 92.5 31 11 US-09-730-289B-3121 Sequence	14.8 92.5 31 11 US-09-730-289B-3120 Sequence	14.8 92.5 31 11 US-09-730-2898-3119 Sequence:	14.8 92.5 31 11 US-09-/30-289B-3118 Sequence	THE OPEN SET IT WOUND THE COMMENTS OF THE COMM	14 6 62 5 31 11 HS-00-730-289B-3117 Semience	14.8 92.5 31 11 US-09-730-289B-3116 Sequence	14.8 92.5 31 11 US-09-730-289B-3115 Sequence.	14.8 92.5 31 11 US-09-730-2898-3114 Sequence	THE OWNER OF THE CONTROL OF THE CONT	14 8 03 5 31 11 IIS-00-730-289B-3113 Semience	14.8 92.5 31 11 US-09-730-289B-3112 Sequence	14.8 92.5 31 11 US-09-730-289B-3111 Sequence	14.8 92.5 St it US-09-730-2036-3110 Sequence	14 0 02 E 31 11 IIC-00-730-280R-3110 Semience	14.8 92.5 31 11 US-09-730-289B-3109 Sequence	14.8 92.5 31 11 US-09-730-289B-3108 Sequence 3	14.6 92.5 31 11 05-03-730-3107 sequence	THE COUNTY OF TH	14 8 92 5 31 11 IIS-09-730-289R-3106 Semience	14.8 92.5 31 11 US-09-730-289B-3105 Sequence	14.8 92.5 31 II US-09-/30-289B-3IO4 Sequence	14.0 92.3 St. II US-US-/3U-2035-31U-3 Sequence	1/ 0 00 E 21 11 ITC-00-730-300B-3103 Commonto	14.8 92.5 31 11 US-09-730-289B-3102 Sequence	14.8 92.5 31 11 US-09-730-289B-3101 Sequence	14.0 94.0 31 11 10-09-130-1300 3101 Commence 1	14.8 92.5 31 11 US-09-730-289B-3100 Sequence	14.8 92.5 31 11 US-09-730-289B-3099 Sequence	14.8 92.5 31 11 US-09-730-289B-3098 Sequence	14 B 02 E 31 11 IIC-00-730-280R-3008 Semience
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PRIOR APPLICATION NUMBER: 60/187,128
PRIOR FILING DATE: 2000-03-06
NUMBER OF SEQ ID NOS: 49
SOFTWARE: PatentIn version 3.0
SEQ ID NO 21
LENGTH: 16
TYPE: DNA
TYPE: DNA
ORGANISM: Artificial Sequence
                     ; FEATURE:
; OTHER INFORMATION: Description of Artificial Sequence:
US-09-877-526A-21
                                                                                                                                                                                                                                 US-09-877-526A-21
                                                                                                                                                                                                         Sequence 21, Application US/09877526A Patent No. US20020102568A1 GENERAL INFORMATION:
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Query Match
Best Local Similarity
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                                                                                                        APPLICANT: Blatt, Larry
APPLICANT: Vaish, Narenda
TITLE OF INVENTION: A PROCESS for the Detection
FILE REFERENCE: MSHB00-816-C (700/002)
CURRENT APPLICATION NUMBER: US/09/877,526A
CURRENT FILING DATE: 2001-03-06
                                                                                                                                                                           APPLICANT: Ribozyme Pharmaceuticals,
APPLICANT: Usman, Nassim
APPLICANT: McSwiggen, Jim
APPLICANT: Zinnen, Shawn
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Seiwert, Scott
Haeberli, Pete
Chowrira, Bharat
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93.8%;
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Score 14.8; DB Pred. No. 54;
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AT: Haeberli, Pet.

ANT: Beigelman, Leo

CANT: Karpeisky, Alex

LICANT: Reynolds, Mark

APPLICANT: Zwick, Michael

APPLICANT: Jarvis, Thale

APPLICANT: Moolf, Todd

APPLICANT: Mothic-Adamic, Jasenka

APPLICANT: Matulic-Adamic, Jasenka

APPLICANT: Matulic-Adamic, Jasenka

APPLICANT: Mouleic Acid Molecules with No. US'

TITLE OF INVENTION: Nucleic Acid Molecules with No. US'

TITLE OF INVENTION: Nucleic Acid Molecules with No. US'

TITLE OF INVENTION NUMBER: US/09/866,316B

CURRENT APPLICATION NUMBER: US/09/866,316B

CURRENT FILING DATE: 1998-06-23

PRIOR FILING DATE: 1998-06-23

PRIOR FILING DATE: 1998-04-20

NUMBER OF SEQ ID NOS: 15

SOFTWARE: Patentin version 3.0

SEQ ID NO 15

LENGTH: 16

TYPE: DNA

TANISM: Artificial Sequence

"WATION: Description

92.5
                             APPLICANT: Stinchcomb, Dan
APPLICANT: Draper, Ken
APPLICANT: Draper, Ken
APPLICANT: McSwiggen, Jim
APPLICANT: Levels of NF-Kappa B
FILE OF INVENTION: Levels of NF-Kappa B
FILE REFERENCE: 400/022 (MSH800-812-D)
CURRENT APPLICATION NUMBER: US/09/864,785
CURRENT FILING DATE: 2001-05-23
NUMBER OF SEQ ID NOS: 3929
SOFTWARE: Patentin version 3.0
SEQ ID NO 3928
LENGTH: 16
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US-09-866-316B-15
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GENERAL INFORMATION:
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APPLICANT: Ribozyme Pharmaceuticals,
                                                                                                                                                                                                                                                                                                                        Sequence 3928, Application US/09864785 Patent No. US20020177568A1
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Best Local Similarity
Matches 15; Conserv
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TYPE: DNA ORGANISM: Artificial Sequence FEATURE:
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Pred. No. 54;
1; Mismatches
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US-09-992-160-21
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                                    US-09-730-289B-3896
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                                                                                                                SEQ ID NO 3896
LENGTH: 16
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Best Local
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Best Local Similarity
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NUMBER OF SEQ ID NOS: 3897
SOFTWARE: PatentIn version 3.0
                                                                                                                                                                                                     APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Method and Reagent for Treatment of Cardiac Disease
FILE REFERENCE: Method. 44. (400/006)
CURRENT APPLICATION NUMBER: US/09/730,289B
CURRENT FILING DATE: 2000-12-05
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SEQ ID NO 21
LENGTH: 16
TYPE: DNA
ORGANISM: Artificial Sequence
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CURRENT FILING DATE: 2001-11-05
NUMBER OF SEQ ID NOS: 58
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TITLE OF INVENTION: Nucleic Acid Sensor Molecules
FILE REFERENCE: MBHB00-816-D (700/004)
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                                                   OTHER INFORMATION:
                                                                               ORGANISM: Artificial
                                                                                                   TYPE: DNA
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Chowrira, Bharat
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Pred. No. 54;
                                                of Artificial Sequence:
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                                                                                                                                                                                                                                                                      APPLICANT: Morrissey, Dave
TITLE OF INVENTION: Method and Reagent for Inhibiting Hepatitis B Virus Replication
FILE REFERENCE: MBHB00-845-H (400/029)
CURRENT APPLICATION NUMBER: US/09/877,478
CURRENT FILING DATE: 2001-12-31
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APPLICANT: Chowrira, Bharat
APPLICANT: Haeberli, Pete
TITLE OF INVENTION: Method and Reagent for the Inhibition
FILE REFERENCE: MBHB00,878-A (400/011)
CURRENT APPLICATION NUMBER: US/09/780,533A
CURRENT FILING DATE: 2001-02-09
                                                                                                                                                                   PRIOR APPLICATION NUMBER: US 07/882,712
PRIOR PILING DATE: 1992-05-14
PRIOR APPLICATION NUMBER: US 09/531,025
PRIOR FILING DATE: 2000-03-20
PRIOR PILING DATE: 2000-08-09
PRIOR FILING DATE: 2000-08-09
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APPLICANT: Draper, Kenneth
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nes 15; Conserv
                             APPLICATION NUMBER: US 08/434,504
                                                                           APPLICATION NUMBER: US 08/433,993
                                                                                           APPLICATION NUMBER: US 08/193,627 FILING DATE: 1994-02-07
                                                                                                                               APPLICATION NUMBER: US 09/696,347 FILING DATE: 2000-10-24
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RESULT 9
US-09-776-474-2991
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Publication No. US20030073207A1
GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals, Inc.
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Best Local (
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SOFTWARE: PatentIn version 3.0
SEQ ID NO 6585
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                                                                                                                                        APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Method and Reagent for the Inhibition of Checkpoint Kinase-1 (CHE
TITLE OF INVENTION: Enzyme
FILE REFERENCE: MBHB00-955-A (400/008)
CURRENT APPLICATION NUMBER: US/09/776,474
CURRENT FILING DATE: 2001-02-02
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       TITLE OF INVENTION: Enzymatic Nucleic Acid Treatment of Diseases or Conditions Relate TITLE OF INVENTION: Levels of Epidermal Growth Factor Receptors FILE REFERENCE: MBHB00-958-I (400/018)
CURRENT APPLICATION NUMBER: US/09/848,754A
CURRENT FILING DATE: 2001-05-03
NUMBER OF SEQ ID NOS: 9645
SOFTMARE: PatentIn version 3.0
                                                        SOFTWARE: PatentIn version 3.0 EQ ID NO 2991
                                                                                                           PRIOR APPLICATION NUMBER: US 60/179,983
                                                                                                                                                                                                                                                                                                                                         APPLICANT: Ribozyme Pharmaceuticals,
                                                                                             NUMBER OF SEQ ID NOS: 2992
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ORGANISM: Artificial Sequence
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 ORGANISM: Artificial Sequence
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Pred. No. 54;
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APPLICANT: MCSWiggen, Jim
TITLE OF INVENTION: Method and Reagent for the Treatment of Alzheimer's Disease;
FILE REFERENCE: MBHB00,918-A 400/027;
CURRENT APPLICATION NUMBER: US/09/930,423;
CURRENT FILING DATE: 2001-08-15
NUMBER OF SEQ ID NOS: 4553
SOFTWARE: Patentin version 3.0
SEQ ID NO 4549
LENGTH: 10
                                                            ; OTHER INFORMATION: Description of Artificial Sequence: US-09-780-164-2602
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US-09+780-164-2602
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                                                                                                                                                        PRIOR APPLICATION NUMBER: 60/185,516
PRIOR FILING DATE: 2000-02-28
NUMBER OF SEQ ID NOS: 2603
SOFTWARE: Patentin version 3.0
SEQ ID NO 2602
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Matches
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Publication No. US20030092646A1
GENERAL INFORMATION:
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Matches
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                            Query Match
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APPLICANT: Blatt, Larry
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Method and Reagent for the Inhibition of CD20
FILE REFERENCE: 400/010
                                                                                                                                                                                                                                        CURRENT APPLICATION NUMBER: US/09/780,164
CURRENT FILING DATE: 2001-02-09
                                                                                                       ORGANISM: Artificial Sequence
                                                                                                                           TYPE: DNA
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Pred. No. 54;
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                                                                                                                                  ; OTHER INFORMATION: Description of Artificial Sequence:
US-10-366-191-14
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                                                                 Matches
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Publication No. US20030113891A1
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CURRENT FILLING DATE: 2003-02-12
NUMBER OF SEQ ID NOS: 17
SOPTWARE: Patentin version 3.0
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                                                                                                                                                                                                                                                                                                                     TITLE OF INVENTION: Antibodies Having Specificity for Nucleic Acids FILE REFERENCE: 02-030-A (900/047)
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NUMBER OF SEQ ID NOS: 2617
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PRIOR FILING DATE: 2001-02-09
PRIOR APPLICATION NUMBER: 60/181,797
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                                                                                                                                                                  TYPE: DNA
TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
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ORGANISM: Artificial Sequence
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RGGCTAGCTACAACGA 16
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Haeberli, Peter
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                                                                               92.5%;
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93.8%; Pred. No. 54
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RESULT 14

RESULT 16 US-09-745-237A-4549

Sequence 4549, Application US/09745237A Publication No. US20030143708A1

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US-10-435-044A-20
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; OTHER INFORMATION: catalytic core
US-10-435-044A-19
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LENGTH: 16
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Best Local Similarity
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NUMBER OF SEQ ID NOS: 31
SOFTWARE: PatentIn version 3.1
                                                                                                                                                                                                                                                                                                                                         FILE REFERENCE: 1954-28511
CURRENT APPLICATION NUMBER: US/10/435,044A
CURRENT FILING DATE: 2003-05-12
PRIOR APPLICATION NUMBER: US 09/536,393
PRIOR FILING DATE: 2000-03-28
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PRIOR FILING DATE: 1999-04-02
NUMBER OF SEQ ID NOS: 31
SOFTWARE: PatentIn version 3.1
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APPLICANT: Scherr, Michaela
APPLICANT: Riggs, Arthur D
TITLE OF INVENTION: Method For Identifying Accessible Binding Sites on FILE REFERENCE: 1954-285ii
CURRENT APPLICATION NUMBER: US/10/435,044A
CURRENT FILLING DATE: 2003-05-12
PRIOR APPLICATION NUMBER: US 09/536,393
PRIOR FILLING DATE: 2000-03-28
PRIOR FILLING DATE: 2000-03-28
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APPLICANT: Riggs, Arthur D
TITLE OF INVENTION: Method For Identifying Accessible Binding Sites on RNA
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ORGANISM: Artificial Sequence
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Pred. No. 5
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APPLICANT: Hamblin, Paul
APPLICANT: Ellis, Jonathan
TITLE OF INVENTION: Method and Reagent for the Inhibition of Grb-2-related with Inser
TITLE OF INVENTION: (GRID) Gene
FILE REFERENCE: MBH800-901-A (400/013)
CURRENT APPLICATION NUMBER: US/09/792,818
CURRENT FILING DATE: 2001-02-23
NUMBER OF SEQ ID NOS: 2304
SOFTWARE: Patentin version 3.0
SEQ ID NO 2304
LENGTH: 16
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US-09-792-818-2304
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APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Method and Reagent for the Treatment of Alzheimer's Disease
FILE REFERENCE: 400/007 (MBHB00-918-A)
FILE REFERENCE: 400/007 (MBHB00-918-A)
CURRENT APPLICATION NUMBER: US/09/745,237A
CURRENT FILING DATE: 2002-04-15
NUMBER OF SEQ ID NOS: 4550
SOFTWARE: Patentin version 3.0
SEQ ID NO 4549
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Best Local Similarity
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Best Local
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                                                               APPLICANT: Ribozyme Pharmaceuticals Inc.
APPLICANT: Macejak, Dennis
CURRENT APPLICATION NUMBER: US/10/279,401
                                                                                                                                                                                                                                                                                                                                                                                                 ORGANISM: Artificial Sequence
                                                                                                                                                                                                                                                                                                                                                                                     FEATURE:
               TIE OF INVENTION: In Vivo Models For Screening Inhibitors of Hepatitis B Virus ILB REFERENCE: 400/066 (MBHB01-1336-B)
                                                                                                                                                                                                                                                                                                    Local Similarity
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Pred. No. 54
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CURRENT FILING DATE: 2003-01-27

PRIOR APPLICATION NUMBER: US 60/296,876

PRIOR PILING DATE: 2001-06-08

PRIOR APPLICATION NUMBER: US 60/335,059

PRIOR FILING DATE: 2001-10-24

PRIOR FILING DATE: 2002-03-26

PRIOR FILING DATE: 2002-03-26
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GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwidgen, James
APPLICANT: McSwidgen, James
TITLE OF INVENTION: Nucleic Acid Treatment of
TITLE OF INVENTION: NUCLEIC ACID TISS-A)
FILE REFERENCE: 400/057 (MBHB01-1158-A)
FURRENT APPLICATION NUMBER: US/10/238,700
CURRENT FILING DATE: 2002-09-18
PRIOR APPLICATION NUMBER: PCT/US 02/16840
PRIOR FILING DATE: 2002-05-29
PRIOR APPLICATION NUMBER: US 60/318,471
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US-10-201-389A-13
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US-10-238-700-4666
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Best Local (
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CURRENT FILING DATE: 2002-07-22
NUMBER OF SEQ ID NOS: 23
SOFTWARE: Patentin version 3.0
SEQ ID NO 13
LENGTH: 16
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Best Local Similarity
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APPLICANT: Beigelman, Leonid
APPLICANT: Azhayev, Alex
APPLICANT: Azhayeva, Blena
                                                                                                                                                                                                    Sequence 4666, Application US/10238700 Publication No. US20030153521A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     APPLICANT: Antopolsky, Maxim
TITLE OF INVENTION: ENZYMATIC NUCLEIC ACID PEPTIDE CONJUGATES
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Pred. No. 54;
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RESULT 22
US-10-230-006-2677
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US-10-277-494-445
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Best Local (
                                                                                      SEQ ID NO 2677
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                                                                                                  CURRENT APPLICATION NUMBER: US/10/230,006
CURRENT FILING DATE: 2002-11-18
PRIOR APPLICATION NUMBER: US 60/315,315
PRIOR FILING DATE: 2001-08-28
NUMBER OF SEQ ID NOS: 2678
SOFTWARE: PatentIn version 3.0
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CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: Patentin version 3.0
                                                                                                                                                                                                           APPLICANT: Fosnaugh, Kathy
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: METHOD AND REAGENT FOR THE
FILE REFERENCE: 400/056 (MBHB01-1110)
                                                                                                                                                                                                                                              APPLICANT:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Leve. TITLE OF INVENTION: Epidermal Growth Factor Receptors
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NUMBER OF SEQ ID NOS: 4666
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LENGTH: 16
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                               ORGANISM: Artificial Sequence
                                                     TYPE: DNA
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ORGANISM: Artificial Sequence
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INFORMATION: Description of Artificial Sequence:
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o. US20030186909A1
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Pred. No. 54;
1; Mismatches
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Pred. No. 5
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                                                          ; OTHER INFORMATION: Description US-10-151-116-12
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US-10-151-116-12
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US-10-306-747A-11
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SOFTWARE: PatentIn version 3.0
SEQ ID NO 11
LENGTH: 16
                                                                                                                                                  SOFTWARE: POSEQ ID NO 12
                                                                                                                                                                                                                                                                                                                                                                             Sequence 12, Application US/10151116 Publication No. US20030104985A1
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Best Local
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                            Query Match
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                                                                                                                                                                                           TITLE OF INVENTION: Conjugates and Compositions for Cellular Delivery FILE REFERENCE: MSHB 01.639-B (600/020)
CURRENT APPLICATION INVEST: US1/0/151,116
CURRENT FILING DATE: 2002-05-17
PRIOR APPLICATION INVEST: 60/362,016
PRIOR APPLICATION INVEST: 60/362,016
PRIOR FILING DATE: 2002-03-06
PRIOR FILING DATE: 2002-03-06
PRIOR FILING DATE: 2001-05-18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               TITLE OF INVENTION: Method and Reagent for the Modulation of Female Reproductive TITLE OF INVENTION: Conditions FILE REFERENCE: 01-1735-A (400/070).
CURRENT APPLICATION NUMBER: US/10/306,747A
CURRENT FILING DATE: 2002-11-27
                                                                                                                                                                                NUMBER OF SEQ ID NOS:
                                                                                                                                                                                                                                                                                                                                APPLICANT: Ribozyme Pharmaceuticals, APPLICANT: Matulic-Adamic, Jasenka
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APPLICANT: Sandb
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                                                                                                      ORGANISM: Artificial Sequence
                                                                                                                         TYPE: DNA
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                                                                                                                                    LENGTH: 16
Local Similarity 93.4
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Gordon, Gil
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Pred. No. 54;
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RESULT 25
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Publication No. US20030105051A1
GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: MCSwiggen, Jim
APPLICANT: MCSwiggen, Jim
TITLE OF INVENTION: Nucleic acid treatment
TITLE OF INVENTION: HER2
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US-10-156-306-8013
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CURRENT APPLICATION NUMBER: US/10/163,552
CURRENT FILING DATE: 2002-06-06
NUMBER OF SEQ ID NOS: 1997
SOFTWARE: PatentIn version 3.0
SEQ ID NO 1997
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US-10-157-580A-170
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APPLICANT: McSwiggen, James
APPLICANT: McSwiggen, James
TITLE OF INVENTION: Enzymatic Nucleic Acid Treatment of Diseases or Conditions Relate
TITLE OF INVENTION: Levels of IKK-Gamma and PKR
TITLE OF INVENTION: Levels of IKK-Gamma and PKR
TITLE REFERENCE: MSHB01-664-A (400/050)
FILE REFERENCE: MSHB01-664-A (400/050)
CURRENT PILING DATE: 2002-05-28
CURRENT PILING DATE: 2002-05-28
NUMBER OF SEQ ID NOS: 8013
SOFTWARE: Patentin version 3.0
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Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                           SEQ ID NO 8013
GENERAL INFORMATION:
               Sequence 170, Application US/10157580A Publication No. US20030124513A1
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Local Similarity 93.8%;
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Pred. No. 54;
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US-10-157-580A-170
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APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Enzymatic Nucleic Acid Treatment of Diseases of Diseases of TITLE OF INVENTION: Related To Levels Of HIV
TITLE OF INVENTION: Related To Levels Of HIV
FILE REFERENCE: McHBO1-65-A (400/051)
FILE REFERENCE: McHBO1-65-A (400/051)
CURRENT APPLICATION NUMBER: US/10/157,580A
CURRENT FILING DATE: 2002-08-30
NUMBER OF SEQ ID NOS: 170
SOSTWARE: Patentin version 3.0
SEQ ID NO 170
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US-10-201-394A-13
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US-10-277-494-334
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Best Local Similarity
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LENGTH: 16
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APPLICANT: Vargeese, Chandra
APPLICANT: Adamic, Jasenka
APPLICANT: Karpeisky, Alexander
APPLICANT: Beigelman, Leonid
                                                                                                                                                        Sequence 334, Applic Publication No. US20 GENERAL INFORMATION:
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TITLE OF INVENTION: CONJUGATES AND COMPOSITIONS
TILE REFERENCE: MBHB01-882-B (600/022)
CURRENT APPLICATION NUMBER: US/10/201,394A
CURRENT FILING DATE: 2002-07-22
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SOFTWARE: PatentIn version 3.0
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
TITLE OF INVENTION: Epidermal Growth Factor Receptors
TILE REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
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o. US20030186909A1
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US-10-277-494-336
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APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBH800-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn version 3.0
SEQ ID NO 335
LENGTH: 23
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Query Match
Best Local Similarity
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Best Local Similarity
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                                                OTHER INFORMATION:
-10-277-494-336
                                                                                                                                                  SEQ ID NO 336
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Publication No. US20030186909A1
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APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MHH00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
                                                                                                                                                                NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn version
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TYPE: DNA
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TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
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o. US20030186909A1
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Pred. No. 55;
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Pred. No. 5
Score 14.8; DB Pred. No. 55;
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US-10-277-494-337
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CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn version 3.0
SEQ ID NO 337
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                                                                Best Loc
Matches
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Best Local Similarity
                                                                                                                                                                                                                                           APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn version 3.0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level.
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
                                                                                                                                                                                                                                                                                                                                                               APPLICANT: Ribozyme Pharmaceuticals, APPLICANT: McSwiggen, Jim
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llarity 87.5%;
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Pred. No. 55;
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US-10-277-494-339; Sequence 339; A: Publication No.

Application US/10277494 o. US20030186909A1 RESULT 34

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US-10-277-494-340
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Best Local S
Matches 14
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NUMBER OF SEC. TAVENTION: Epidermal Growth Fac CURRENT APPLICATION NUMBER: US/10/277,494
NUMBER OF SEC. TO THE CONTROL OF SEC. TO THE CURRENT PILING DATE: 2002-10-21
                                                                                                                                                                                                                                       US-10-277-494-341
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TITLE OF INVENTION: Nucleic Acid Treatment of
TITLE OF INVENTION: Epidermal Growth Factor F
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LENGTH: 23
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CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: Patentin version 3.0
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TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
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Best Local 9
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SEQ ID NO 341
           APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANTON: Epidermal Growth Factor Receptors
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
FILE REFERENCE: MBHB00-958-K (400/064)
FILE REFERENCE: MCHARTON NUMBER: US/10/277,494
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: Patentin version 3.0
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ORGANISM: Artificial Sequence
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Sequence 342, Application US/10277494

publication No. US20030186909A1

publication No. US20030186909A1

APPLICANT: Ribozyme pharmaceuticals, Inc.
APPLICANT: Ribozyme pharmaceuticals, Inc.
APPLICANT: Ribozyme pharmaceuticals, Inc.
APPLICANT: NGCWidgen, Jim
APPLICANT: NGCWidgen, Jim
APPLICANT: NGCWidgen, Jim
APPLICANT: NUCLeic Acid Treatment of Diseases or ITILE OF INVENTION: Epidermal Growth Factor Receptors

FILE REFERENCE: MHHB00-958-K (400/064)

FILE REFERENCE: MHBB00-958-K (400/064)

CURRENT APPLICATION NUMBER: US/10/277,494

CURRENT FILING DATE: 2002-10-21

NUMBER OF SEG ID NOS: 446

SOFTWARE: PatentIn version 3.0

SEQ ID NO 342
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Matches 14
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US-10-277-494-343
                                                      US-10-277-494-343
                                                                                                                                           APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANT: Nucleic Acid Treatment of Diseases or conditions Related
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: McHB00-958-K (400/064)
FILE REFERENCE: McHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARB: PatentIn version 3.0
SEQ ID NO 343
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Best Local Similarity
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Matches

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NUMBER OF SEQ ID NOS: 446
SOPTWARE: PATENTIN VERSION 3.0
SEQ ID NO 344
LENGTH: 23
TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
FEATURE:
Search completed: January 21, 2004, 08:22:21 Job time : 155 secs
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APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: Patentin version 3.0
SEQ ID NO 345
LENGTH: 23
TYPE: DNA
ORGANISM: Artificial Sequence
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Publication No. US20030186909A1
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APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
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AA953815 ONT6112.9
AL602406 1M0421H09
BH215494 1106027C1
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BQ625306 rd279G3.y
BH901408 SALK 079
AQ025306 EP(3)T213
BH861777 SALK 0879
BH91412563 mg59bl1.r
BU866082 S062E01 P
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BU867160 S075AD P
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BO bp mRNA linear EST 05-DE Cac_BL_5432 Cac_BL (Bean and Leaf from Amelonardo type Cacao)
Theobroma cacao cDNA clone Cac_BL_5432 5', mRNA sequence.

CA798147
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                                             1 (bases 1 to 80)
Jones, P.G., Allaway, D., Gilmour, D.M., Harris, C.,
E.R. and Jones, C.A.
                                                                                                                             Theobroma cacao (cacao)
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Planta 216 (2), 255-264 (2002)
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    varieties

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                                                                    Email: ddunn@genetics.utah.edu
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Class: plasmid ends
High quality sequence stop: 96.
Location/Qualifiers
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Seq primer: T3.
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Masterfoods
3d Dundee Road, Slough,
Tel: +44 1664 416644
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Contact: Robert B. W
University of Utah G
University of Utah
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Mammalia; Eutheria;
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IM0216F14F Mouse 10kb plasmid UUGC1M library Mus musculus genomic
clone UUGC1M0216F14 F, genomic survey sequence.
AZ431360
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/lab_host="XL-1 Blue MRF'"
/clone lib="Cac_BL (Bean and Cacao)"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   /note="Vector: pBK-CMV; Bean Amelonado type Cacao tree." 17 c 27 g 18 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    /organism="Theobroma cacao"
/mol type="mRNA"
/strain="Amelonado type"
/db_xref="taxon:3641"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /clone="Cac_BL_5432"
/tissue_type="Mature leaf
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Location/Qualifiers
                                                                                                                                                                                         Biomedical
             /mol_type="genomic DNA"
/strain="C57BL/6J"
/db_xref="taxon:10090"
   /clone="UUGC1M0216F14"
                                                organism="Mus musculus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        76.2%;
80.0%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    type="Whole organ"
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                                                                                                                                                                                                                                                            scaffolding with paired end reads from 10kb
                                                                                                                                                                                                                 Genome
                                                                                                                                                                                                                            Weiss
                                                                                                                                                                                                                                                                                                                                Chordata; Craniata; Vertebrata; Euteleostomi;
Rodentia; Sciurognathi; Muridae; Murinae; Mus
                                                                                                                                                                                           Polymers Research Bldg.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Score 12.2; DB 14
Pred. No. 1.2e+04;
2; Mismatches 1
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RESULT 1 CA798147 LOCUS

DEFINITION

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ACCESSION VERSION KEYWORDS

SOURCE

REFERENCE

JOURNAL MEDLINE

PUBMED

BTILL AUTHORS

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REFERENCE
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ORIGIN
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Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               JOURNAL
                                                                               source
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              100 bp DNA linear GSS 14-DEC-20
1M0535M02F Mouse 10kb plasmid UUGC1M library Mus musculus genomic
clone UUGC1M0535M02 F, genomic survey sequence
                                                                                                                                                                                                                                                                                                                                                                                                       Contact: Robert B. Weiss
University of Utah Genome Center
University of Utah
                                                                                                                                  Seq primer: CGTTGTAAAACGACGGCCAGT
Class: plasmid ends
High quality sequence stop: 100.
                                                                                                                                                                                                               Email: ddunn@genetics.utah.edu
Insert Length: 10000 Std Error: 0.00
Plate: 0535 row: M column: 02
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1 (bases 1 to 100)

Dunn,D., Aoyagi,A., Barber,M., Beacorn,T., Duval,B., Hamil,C.,
Islam,H., Longacre,S., Mahmoud,M., Meenen,E., Pedersen,T., Reilly
,M., Rose,M., Rose,R., Stokes,R., Tingey,A., von Niederhausern,A.
and Wright,D.,Weiss,R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      plasmid inserts
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mouse whole genome scaffolding with paired end reads from 10kb
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Mammalia; Butheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus
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801 585 7177
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                                                                                                                                                                                                                                                                                                                                                            USA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      10.5 kb range using preparative agarose gel electrophoresis. Vector DNA was prepared from a derivative of pWD42 (gi|4732114|gb|AF129072.1), a copy-number inducible derivative of plasmid R1. The vector was ligated with adaptors complementary to the insert adaptors and purified. The sheared, adaptored mouse DNA was annealed to adaptored with vector NNA CAR transferred with was annealed to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (http://www.jax.org/resources/documents/dnares/). The DNA was hydrodynamically sheared by repeated passage through a 0.005 inch orifice at constant velocity. The sheared DNA was blunt end-repaired with T4 DNA polymerase and T4 polymucleotide kinase. Adaptor oligonucleotides were ligated to the blunt ends in high molar excess. The adaptored DNA was purified and size-selected for a 9.5 to
                                                                                                                                                                                                                                                                                                                                                                                   Biomedical Polymers Research Bldg., 20 S. 2030 E.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      adaptored vector DNA, and transformed into chemically-competent B. coli XI10-Gold (Stratagene) cells and selected for ampicillin resistance."

32 c 12 g 21 t
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/Clome_lib="Mouse 10kb plasmid UUGCIM library"
/note="Vector: PWD42nv, Purified genomic DNA from M.
musculus C57BL/6J (male) was obtained from the Jackso
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/mol_type="genomic DNA"
/strain="C57BL/6J"
                                                                                                              Location/Qualifiers
                                                        organism="Mus musculus"
                                                                                     . 100
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Pred. No. 2.1e+04;
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AZ658330 RESULT 3

SOURCE KEYWORDS

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FEATURES

COMMENT

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RESULT 4
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ORIGIN
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DEFINITION
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                                                                                                                                                                                                                                                                                                                                                                                               source
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          CDNA Library Preparation: Ling Hong/Rubin Laboratory
CDNA Library Arrayed by: The I.M.A.G.B. Consortium (LLNL)
DNA Sequencing by: Incyte Genomics, Inc.
Clone distribution: MGC clone distribution information can
found through the I.M.A.G.B. Consortium/LLNL at:
http://image.llnl.gov
http://image.llnl.gov
b column: 22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Email: cgapbs-r@mail.nih.gov
Tissue Procurement: DCTD/DTP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   NIH-MGC http://mgc.nci.nih.gov/.
National Institutes of Health, Mammalian Gene Collection (MGC)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Bukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
1 (bases 1 to 44)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                      High quality sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Contact: Robert Strausberg, Ph.D.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Homo sapiens
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/Clone_lib="Mouse 10kb plasmid UUGCIM library"
/note="Vector: PWD42nv; Purified genomic DNA from M.
musculus C57BL/6J (male) was obtained from the Jackso
/clone_lib="NIH_MGC_14"
/note="Organ: kidney; Vector: pOTB7; Site_1: XhoI; Site_2:
/note="Organ: kidney; Vector: poTB7; Site_1: XhoI; Site_2: XhoI; S
                                                                                                                        /clone="IMAGE:4587189"
/tissue_type="renal cell adenocarcinoma"
/lab_host="PH108 (phage-resistant)"
                                                                                                                                                                                                                                                              /organism="Homo sapiens"
/mol_type="mRNA"
/db_xref="taxon:9606"
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                                                                                                                                                                                                                                                                                                                                                                                                                              ocation/Qualifiers
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84.6%;
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Pred. No. 2.2e+04;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               stop: 44.
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ORGANISM
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CNS06E2T
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TITLE
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                                                                    source
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Souciet J.L., Aigle, M., Artiguenave, F., Blandin, G.,
Bolotin-Fukuhara, M., Bon, E., Brottier, P., Casaregola, S.,
de-Montigny, J., Dujon, B., Durrents, P., Lepingle, A., Llorente, B.,
Malpertuy, A., Neuveglise, C., Ozier-Kalogeropoulos, O., Potier, S.,
Saurin, W., Tekaia, F., Toffano-Nioche, C., Wesolowski-Louvel, M.,
Wincker, P. and Weissenbach, J.
Genomic exploration of the hemiascomycetous yeasts: 1. A set of
Genomic exploration exclude revolution studies
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Eukaryota; Fungi; Ascomycota; Saccharomycotina; Saccharomycetes; Saccharomycetales; Saccharomycetaceae; Zygosaccharomyces.

1 (bases 1 to 60)
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T3 end of clone AROAA018A08 of library AROAA from strain CBS
Zygosaccharomyces rouxii, genomic survey sequence.
                                                                                                                                                                                                                                                                                                               Submitted (06-SEP-2000) Genoscope - Centre National de Sequencage, 2 rue Gaston Cremieux, CP 5706, 91057 EVRY Cedex, FRANCE. (E-mail: seqref@genoscope.cns.fr - Web : www.genoscope.cns.fr)
This GSS is part of a random genomic sequencing program of thirteen yeast species: Saccharomyces bayanus var. uvarum, Saccharomyces bayanus var. uvarum, Saccharomyces
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       de Montigny,J., Straub,M., Potier,S., Tekaia,F., Dujon,B., Wincker,P., Artiguenave,F. and Souciet,J.
Genomic exploration of the hemiascomycetous yeasts: 8.
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Zygosaccharomyces rouxii
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AL394587
AL394587.1 GI:12145628
                                                                                         lactis var. lactis, Kluyveromyces marxianus var. marxianus, Pichia angusta, Debaryomyces hansenii var. hansenii, Pichia sorbitophila, Candida tropicalis and Yarrowia lipolytica. Genomic inserts of 3 to 5 kb were prepared and both extremities were sequenced. See keywords for description of this sequence and for the sequence of the other extremity of this insert.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          FEBS Lett. 487
                                                                                                                                                                                                                                                                   exiguus, Saccharomyces servazzii, Zygosaccharomyces rouxii,
Saccharomyces kluyveri, Kluyveromyces thermotolerans, Kluyveromyces
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Genoscope
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (bases 1 to 60)
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strain="CBS 732"
                  /mol_type="genomic DNA"
                                            organism="Zygosaccharomyces"
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75.0%;
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Pred. No. 2e+04;
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CB366166
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12; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Plate: ZF001-P00049-DPE-F2-D
seq primer: CCGCATAACTTGTATAGCA
High quality sequence stop: 67.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Laboratory of Molecular Biotechnology
Genome Institute of Singapore
1 Science Park Road, The Capricorn #05-01, Singapore 117528
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Danio rerio
Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Actinopterygii; Neopterygii; Teleostei; Ostariophysi; Cypriniformes
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       CB366166
67 bp mRNA linear EST 17-MAR-;
ZF001-P00049-DPB-F2-D_F10 GISZF001 Danio rerio cDNA clone
IMAGE:6910149 5' similar to fp15a03.y1 zebrafish gridded kidney
Danio rerio cDNA clone IMAGE:4729612 5' similar to WP:CE25522
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Mathavan, S., Wei, C., Thoreau, H., Chia, J.M. and Ruan, Y. Genome Institute of Singapore, Zebrafish EST Collection
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          i (bases 1 to 67)
Mathavan, S., Wei, C.,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Tel: +65 6827 5200 Fax: +65 6827 5201
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Email: gisry@nus.edu.sg
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Contact: Ruan Y
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Unpublished
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  19
                                     ste GGCCGCCTCGGCC; 3'linker/adaptor sequence: same as the priming sequence; Average insert size: 2kb; For PCR insert analysis: Use M13 Forward and reverse primers; Library Amplified Recombinants (inserts): 98%; Library complexity: 5x106; Pull-length construction (method): SMART, a Clontech method; Library constructed by: S. Mathavan, Chia-Lin Wei, and Yilun Ruan Constructed by: S.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 /clone_lib="AR0AA"
/note="end : T3"
25 c 11 g
                                                                                                                                                                               /note="Vector: pDNR-LIB; site 1: Sfi A (GGCCATTACGGCC);
Site 2: Sfi B (GGCCGCCTCGGCC); Priming method: Sfi-(dT)30
Primed; Priming sequence: 5.ATTCTAGA GGCCGAGGGGGC
GACATG(T)30VN; Directionally cloned, 5' cloning site:
Sfi A site GGCCATTACGGCC; 5' linker/adaptor sequence:
5.AAGCAGTGGTATCAACGCAGAGTGGCC; 3' cloning site: Sfi B
site GGCCGCCTCGGCC; 3' linker/adaptor sequence: same
                                                                                                                                                                                                                                                                                                                                           /tissue_type="mmbryo"
/dev stage="7 Different embryonic Stages( From just
/dev stage="7 Different embryonic Stages( From just
fertilized Embryos to 72 hours just hatched baby fish)"
/lab host="DH10B"
/lab host="DH10B"
/clone_lib="GISZF001"
                                                                                                                                                                                                                                                                                                                                                                                                                                                        /organism="Danio rerio"
/mol_type="mRNA"
/db_xref="taxon:7955"
/clone="IMAGE:6910149"
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Pred. No. 2
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AB953865

on76a12.sl Soares_NFL_T_GBC_Sl Homo sapiens cDNA clone
IMAGE:1562590 3' similar to TR:Q92615 Q92615 MYELOBLAST KIAA0217 ;,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Email: nelsayed@tigr.org
Details of T. brucei sequencing at the Sanger Centre are available at http://www.sanger.ac.uk/Projects/T_brucei/.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  to give a tight size distribution (
4 kb). The v + i method used for the library construction is
described in detail in Smith, H. and Venter, J.C. (Making small
insert libraries for whole genome shotgun sequencing projects.
Genome Sequencing: A Practical Approach, eds. M. Vaudin and B.
Barrell, Oxford University Press, 1999).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Constructed at the Institute for Genomic Research (TIGR), Rockville, MD. Genomic DNA isolated from a cloned population Trypanosoma brucei (TREU927/4 GUTat 10.1) was mechanically sh
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Direct Submission
Submitted (10-DEC-2000) Trypanosoma brucei genome sequencing project, Sanger Centre, The Wellcome Trust Genome Campus, Hinxton, Cambridge CB10 1SA, B-mail: barrell@sanger.ac.uk and nhl@sanger.ac.uk
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Hall,N., Bowman,S., Lennard,N.J., Doggett,J., Atkin,R., Chillingworth,C., Ormond,D., Harris,B., El-Sayed,N., Hou,L., Melville,S.E., Rajandream,M.A. and Barrell,B.G.
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Homo sapiens (human)
                                   AA953865.1 GI:3116783
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/mol_type="genomic DNA"
/strain="TREU927"
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/clone="87h09"
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Pred. No. 2.6e+04;
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A clone 87h09, reverse sequence,
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                                                                                                                                                                 Dunn, D., Aoyagi, A., Barber, M., Beacorn, T., Duval, B., Hamil, C., Islam, H., Longacre, S., Mahmoud, M., Meenen, E., Pedersen, T., Reilly, M., Rose, M., Rose, R., Stokes, R., Tingey, A., von Niederhausern, A. and Wright, D., Welss, R.
Mouse, whole genome scaffolding with paired end reads from 10kb
                                                                                                                                                                                                                                                Mammalia; Eutheria;
1 (bases 1 to 90)
Dunn, D., Aoyagi, A.,
                                                                                                                                                                                                                                                                                                                                                                                                                        1M0421H09F Mouse 10kb plasmid clone UUGC1M0421H09 F, genomic AZ602406
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Email: cgapbs-r@mail.nih.gov
This clone is available royalty-free throug
IMAGE Consortium (info@image.llnl.gov) for
Trace considered overall poor quality
Seq primer: -40ml3 fwd. ET from Amersham
High quality sequence stop: 1.
                                                             University of Utah University of Utah
                                                                                                                                                                                                                                                                                           Eukaryota; Metazoa; Chordata; Mammalia; Eutheria; Rodentia;
                                                                                                                                                                                                                                                                                                                                     Mus musculus
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National Cancer Institute, Cancer Genome Anatomy Project (CGAP),
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                        84112,
                                         Rm. 308,
                                                                                                          Contact: Robert B.
                                                                                                                        Unpublished
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Tel: 801 585 5606
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/clone lib="Soares NFL T GBC S1"
/note="Organ: pooled; Vector: p7773D-Pac (Pharmacia) with a modified polylinker; Site 1: NCI I; Site 2: Eco RI; Equal amounts of plasmid DNA from three normalized libraries (fetal lung NbHL19W, testis NHT, and B-cell NCI CGAP GCB1) were mixed, and se circles were made in vitro. Following HAP purification, this DNA was used as tracer in a subtractive hybridization reaction. The driver was PCR-amplified cDNAs from pools of 5,000 clones made from the same 3 libraries. The pools consisted of I.M.A.G.E. clones 297480-302087, 682632-687239, 726408-728711, and 72996-731399. Subtraction by Bento Soares and M. Fatima Bonaldo. "
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mol_type="mRNA"

db_xref="taxon:9606"
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| lab_host="DH10B"
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Insert Length: 10000 Std Err
Plate: 0421 row: H column: 0
                                             Tel: 650 723 2227 Fax: 650 725 8221
                                                                                       855 California Ave, Palo Alto,
                                                                                                                 Stanford University
                                                                                                                                    Contact: Walbot V
Department of Biological Sciences
                                                                                                                                                                                                                                                                       Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; Liliopsida; Poales; Poaceae; PACCAD clade; Panicoideae; Andropogoneae; Zea.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Seq primer: CGTTGTAAAACGACGGCCAGT
Possible ligation site of ends cut by 2 different endonucleases.
                                                                                                                                                                                                         Maize genomic sequences found using engineered RescueMu transposon
                                                                                                                                                                                                                                                                                                                                                                      Zea mays
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AGGCTGGCCACAACTA 50
                                                                                                                                                                                                                                                 (bases 1 to 93)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             was hydrodynamically sheared by repeated passage through a 0.005 inch orifice at constant velocity. The sheared DNA was blunt end-repaired with T4 DNA polymerase and T4 polymucleotide kinase. Adaptor oligonucleotides were ligated to the blunt ends in high molar excess. The adaptored DNA was purified and size-selected for a 9.5 to 10.5 kb range using preparative agarose gel electrophoresis. Vector DNA was prepared from a derivative of plasmid R1. The vector was ligated with adaptors complementary to the insert adaptors and purified. The sheared, adaptored on the sheared and purified the sheared, adaptored into
                       walbot@stanford.edu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          adaptored vector DNA, and transformed into chemically-competent E. coli Xi10-Gold (Stratagene) cells and selected for ampicillin resistance."

18 c 28 g 30 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           /lab_host="B. Coli strain XL10-Gold, T1-resistant, F-" /clone lib="Mouse 10kb plasmid UUGCIM library" /note="Vector: pW042nv, Purified genomic DNA from M. musculus C57BL/6J (male) was obtained from the Jackson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (http://www.jax.org/resources/documents/dnares/).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Laboratory Mouse DNA Resource
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       'sex="Male
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            clone="UUGC1M0421H09"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  db_xref="taxon:10090"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          organism="Mus musculus"
mol_type="genomic DNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ocation/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          strain="C57BL/6J"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  72.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               <u>۵</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 11.6; DB 28
Pred. No. 2.7e+04;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Std Error:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              93 bp DNA
RescueMu Grid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                          CA 94304,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0.00
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 28;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                linear GSS 08-NOV-2001
G Zea mays genomic, genomic
                                                                                          TSD.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Length 90;
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REFERENCE
AUTHORS
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VERSION
KEYWORDS
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BG695449/c
LOCUS
                                                                                                  FEATURES
                                                                                                                                                                                                                                                                                                                                                      COMMENT
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              FEATURES
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
Best Local S
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Matches
                                                                                                                                                                                                                                                                                                                                                                                                                TITLE
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                                                                                 source
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   l Similarity
12; Conser
                                                                                                                                                                                                                                                                Email: cgapbs-r@mail.nih.gov
CDNA Library Preparation: M. Bento Soares Laboratory
CDNA Library Arrayed by: The I.M.A.G.E. Consortium/
DNA Sequencing by: National Institutes of Health In
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             99 bp
NISC iv17f07.w2 Soares NMBP2 pit
IMAGE:4318212 5', mRNA sequence.
BG695449
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          2 GGCTAGCHACAACG 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Plate: 1006027 row: 42
Class: transposon-tagged
                                                                                                                                                                                                                          Sequencing Center (NISC) Clone distribution information can
                                                                                                                     Seq primer: T7
                                                                                                                                                                                 found through the I.M.A.G.E. Consortium/LLNL info@image.llnl.gov
                                                                                                                                                                                                                                                                                                                                                                                                             NCI-CGAP http://www.ncbi.nlm.nih.gov/ncicgap.
National Cancer Institute, Cancer Genome Anatomy Project (CGAP),
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Eukaryota; Metazoa;
Mammalia; Eutheria;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mus musculus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BG695449.1 GI:13955375
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Reverse complemented post-ligation sequence from source sequence.
                                                                                                                                                                                                                                                                                                                                                    Contact: Robert Strausberg, Ph.D.
                                                                                                                                                                                                                                                                                                                                                                       Unpublished
                                                                                                                                                                                                                                                                                                                                                                                            Tumor Gene Index
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mus musculus (house mouse)
                                                                                                                                           Plate: LLAM9923 row: K
                                                                                                                                                                MGI:1598980
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    GGCAAGCAACAACG
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        /clone_lib="1006 - RescueMu Grid G"
/clone="Torgan: leaf; Vector: RescueMu (engineered from
/note="Torgan: leaf; Vector: RescueMu; Site_2: BgIII;
pBlueScript backbone); Site_1: BamHI; Site_2: BgIII;
RescueMu is a 4.9 kb, modified maize Mu transposon
designed to allow plasmid rescue from total genomic DNA.
Mu elements insert preferentially into transcription
units For more information on RescueMu, go to the web
site 'www.zmdb.iastate.edu' and follow the links for
'RescueMu.' Grid G was grown at Stanford in 2000. DNA was
extracted from leaf punches, double digested using BamHI
and BgIII, and ligated to form circular plasmids. DH10B
cells were transformed and then screened on LB plates with
                 /mol_type="mRNA"
/db_xref="taxon:10090"
                                                         organism="Mus musculus"
                                                                                                Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ocation/Qualifiers
clone="IMAGE: 4318212"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               dev_stage="adult"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  tissue_type="leaf"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            db_xref="taxon:4577"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             cultivar="mixed background W23/A188/B73"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  lab host="DH10B"
                                                                                 . 99
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85.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        17 c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Chordata;
Rodentia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 11.6; DB 28;
Pred. No. 2.7e+04;
L; Mismatches 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     39 g
                                                                                                                                             column:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            pituitary Mus musculus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Craniata; Vertebrata; Euteleostomi; Sciurognathi; Muridae; Murinae; Mus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 mRNA
                                                                                                                                                                                                                                                                     . Consortium/LLNL of Health Intramural
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               linear
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            EST 04-MAY-2001
CDNA clone
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Murinae; Mus.
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tissue_type="pituitary gland"

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SOURCE
ORGANISM
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1 (bases 1 to 100)

McCarter,J., Clifton,S., Chiapelli,B., Pape,D., Martin,J., Wylie,T.,

Dante,M., Marra,M., Hillier,L., Kucaba,T., Theising,B., Bowers,Y.,

Gibbons,M., Ritter,E., Bennett,J., Franklin,C., Taggareishvili,R.,

Ronko,I., Kennedy,S., Maguire,L., Beck,C., Underwood,K., Steptoe

M., Allen,M., Person,B., Swaller,T., Harvey,N., Schurk,R., Kohn,S.,

Shin,T., Jackson,Y., Cardenas,M., McCann,R., Waterston,R. and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Email: est@watson.wustl.edu
The library was constructed by Claire Murphy and Dr. James McCarter
The library was constructed by Claire Murphy and Dr. James McCarter
at Washington University, St. Louis. Meloidogyne incognita eggs
were provided by Andrew Kloek of Divergence Inc., St. Louis, MO.
Putative full length read
The vector to vector length is 101
Seq primer: -40RP from Gibco.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The Washington Univ. Nematode EST Project, 1999 Washington University School of Medicine 4444 Forest Park Parkway, Box 8501, St. Louis, Parkway, Box 8501, S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1 RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      rd27g03.y1 Meloidogyne incognita egg SL1 TOPO v1 Meloidogyne incognita cDNA 5', mRNA sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Unpublished
Contact: McCarter JP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The Washington Univ. Nematode EST Project,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Wilson, R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Eukaryota; Metazoa; Nematoda; Chromadorea; Tylenchida; Tylenchina;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Meloidogyne incognita
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Meloidogyne incognita (southern root-knot nematode)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BQ625306.1 GI:21652484
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BQ625306
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Tylenchoidea; Heteroderidae; Meloidogyninae; Meloidogyne
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Similarity
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314 286 1810
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/organism="Meloidogyne incognita"
/mol type="mRNA"
/mol type="mRNA"
/mol type="mRNA"
/db xref="taxon:6306"
/dev stage="egg"
/lab host="pH10B (Invitrogen)"
/lab host="PH10B (Invitrogen)"
/clone lib="Meloidogyne incognita egg SL1 TOPO v1"
/note="Vector: pCRII-TOPO (Invitrogen); Site 1: EcoRI;
Site 2: EcoRI; The library was constructed by Claire
Murphy and Dr. James McCarter at Washington University,
St. Louis. Oligo(dT)-SL1 PCR based library. cDNA PCR
products of size >400 nucleotides containing SL1 on the 5'
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         double-stranded cDNA was ligated to EcoRI adaptors 5'-AATTCGGCACGAGG-3' AND 5'-CCTCGTGCCG-3' (Pharmacia), digested with NotI and cloned into the NotI and EcoRI sites of the pTTT3D-PacI vector. Library went through round of normalization, and was constructed in the laboratory of M. Bento Soares (University of Iowa)." 3 g 35 t
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/clone_lib="Soares NMBP2 pituitary"
/note="Organ: brain; Vector: pT7T3D-Pac;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Location/Qualifiers
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/lab_host="DH10B (phage-res
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75.0%;
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2: Table 1: 1st strand cDNA was primed with a 5(dT) primer
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Pred. No. 2.8e+04;
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                                        2 GGCTAGCHACAA 13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Contact: Joseph R. Ecker
Salk Institute Genomic Analysis Laboratory (SIGnAL)
The Salk Institute The Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 92037, USA
Tel: 858 453 4100 x1752
Fax: 858 558 6379
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Alonso, J.M., Leisse, T.J., Barajas, P., Chen, H., C., Jeske, A., Karnes, M., Kim, C.J., Parker, H., Zimmerman, J. and Ecker, J.R.
A Sequence-Indexed Library of Insertion Mutatic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids; eurosids II; Brassicales; Brassicaceae; Arabidopsis.

1 (bases 1 to 26)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               BH901408 26 bp DNA linear GSS SALK 079024.36.15.x Arabidopsis thaliana TDNA insertion Arabidopsis thaliana genomic clone SALK 079024.36.15.x,
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12; Conser
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ecker@salk.edu
                                                                                                                                                                            /clone_lib="Ārabidopsis thaliana TDNA insertion lines"
/note="PCR was performed on Arabidopsis thaliana lines
each of which contains one or more TDNA insertion
elements. The resultant fragment for each line was
directly sequenced to determine the genomic sequence at
the site of insertion. Details of the protocols used can
be found at http://signal.salk.edu/tdna_protocols.html"
a 6 c 3 g 11 t
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                                                                                                                                                                                                                                                                                                                                                                                       /organiém="Arabidopsis thaliana"
/mol_type="genomic DNA"
/strain="Columbia 0"
                                                                                                                                                                                                                                                                                                                                              /db_xref="taxon:3702"
/clone="SALK_079024.36.15.x"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ocation/Qualifiers
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                                                                              Score 11.2; DB 28
Pred. No. 2.8e+04;
1; Mismatches 0
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Pred. No. 2.8e+04;
2; Mismatches 2
                                                                                                                     DB 28;
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                                                                                                                                                                                                                                                        Local Similarity
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                            SALK 087974 Arabidopsis thaliana TDNA thaliana genomic clone SALK_087974, generals 1777
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AQ025306

BP(3)3213 Drosophila melanogaster EP line genomic Sequence recovered from 5' end of
                                                                                                                                                                                                                                      11;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Berkeley Drosophila Genome Project
University of California, Berkeley
LSA Building, Berkeley, CA 94720-3200,
               BH861777.1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The P element insertion position
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence orientation is forward strand relative to 5'
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Email:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Drosophila melanogaster
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Liao, G.-C., Rehm, E.J. and Rubin, G.M.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Neoptera; Endopterygota; Diptera; Brachycera; Muscomorpha;
Ephydroidea; Drosophilidae; Drosophila
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Eukaryota; Metazoa; Arthropoda; Hexapoda; Insecta; Pterygota;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Drosophila
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Contact: Gerald Rubin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               10716700
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AQ025306.1 GI:3265658
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    insertion position refers to the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Drosophila melanogaster (fruit fly)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Insertion site preferences of the P transposable element
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                                                                                                                                                                                                                                                                                                                                                                                     /Clone lib="Drosophila melanogaster EP line"
/note="Inverse PCR was performed on Drosophila
melanogaster strains each of which contains a single EP
transposable element insertion. (The generation of these
insertion strains is described in Rorth P, Szabo K, Bailey
A, Laverty T, Rehm J, Rubin GM, Weigmann K, Milan M, Benes
V, Ansorge W, Cohen SM. 1998. Systematic gain-of-function
genetics in Drosophila. Development 6:1049-1057.) The
resultant fragment for each strain was directly sequenced
                                                                                                                                                                                                                                                                                                                      to determine the genomic sequence at the site of insertion. Details of the protocols used can be found at http://fruitfly.berkeley.edu/p_disrupt/inverse_pcr.html." 13 c 10 g 7 t
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 db_xref="taxon:7227"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             /organism="Drosophila melanogaster"
/mol_type="genomic DNA"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ocation/Qualifiers
                 GI:22097103
                                                                                                                                                                                                                                                      70.0%;
78.6%;
                                                                                                                                                                                                                                                      Score 11.2; DB 28
Pred. No. 3.1e+04;
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                                              genomic survey sequence.
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Contact: Joseph R. Ecker
Salk Institute Genomic Analysis Laboratory (SIGnAL)
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 92037, USA
Tel: 858 453 4100 x1752
                                                                                                                                                                                                                         1 (bases 1 to 49)
1 (bases 1 to 49)
Alonso,J.M., Leisse,T.J., Barajas,P.,
The A. Karnes,M., Kim,C.J., P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BH861778 49 bp DNA linear GSS 05-AUG-20 SALK 087975 Arabidopsis thaliana TDNA insertion lines Arabidopsis thaliana genomic clone SALK_087975, genomic survey sequence.
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Salk Institute Genomic Analysis Laboratory (SIGnAL)
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 92037, USA
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, Zimmerman,J. and Ecker,J.R.
A Sequence-Indexed Library of
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1 (bases 1 to 49)
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                                                                                                                                                                                                                                                                                                                   Spermatophyta; Magnoliophyta; eudicotyledons; core eud; eurosids II; Brassicales; Brassicaceae; Arabidopsis.
                                                                                                                                                                                                                                                                                                                                               Bukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosid
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                                                                                                                                                         Arabidopsis Genome
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Zimmerman,J. and Ecker,J.R.
Sequence-Indexed Library of Insertion
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/note="PCR was performed on Arabidopsis thaliana lines
each of which contains one or more TDNA insertion
elements. The resultant fragment for each line was
directly sequenced to determine the genomic sequence at
the site of insertion. Details of the protocols used can
be found at http://signal_salk.edu/tdna_protocols.html"
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strain="Columbia 0"
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Pred. No. 3.6e
1; Mismatches
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Kim,C.J., Parker,H.,
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Prednis, L.,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Contact: Marra M/Mouse EST Project
WashU-HHMI Mouse EST Project
washington University School of MedicineP
4444 Forest Park Parkway, Box 8501, St. Ld
Tel: 314 286 1800
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This is single pass sequence recovered from the left border of TDNA. This sequence lies within an annotated exon of At5g01330.
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Marra,M., Hiller,L., Allen,M., Bowles,M., Dietrich,N., Dubuque,T.,
Geisel,S., Kucaba,T., Lacy,M., Le,M., Martin,J., Morris,M.,
Schellenberg,K., Steptoe,M., Tan,F., Underwood,K., Moore,B.,
Theising,B., Wylie,T., Lennon,G., Soares,B., Wilson,R. and
Waterston,R.
                                                                                                                                                                    Trace considered overall poor quality possible reversed clone: similarity or Seq primer: -28M13 rev2 from Amersham High quality sequence stop: 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AA142563 55 bp mRNA linear EST 18-FEB-1 mq59b11.rl Soares thymus 2NbMT Mus musculus cDNA clone IMAGE:583 5' similar to TR:G1203965 G1203965 BONE-DERIVED GROWTH FACTOR;
                                                                                                                                                                                                                                                                                                                                                                                                                      Email: mouseest@watson.wustl.edu
This clone is available royalty-free through LLNL; contact the
IMAGE Consortium (info@image.llnl.gov) for further information.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The WashU-HHMI Mouse EST Project Unpublished
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/clone | ib="Arabidopsis thaliana TDNA insertion lines"
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/clone | ib="Cou
/organism="Mus musculus"
/mol_type="mRNA"
/strain="C57BL/6J"
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Pred. No. 3.6e+04;
1; Mismatches 0;
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                                                                                                                                                                                                                                                        source
54
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Populus tremula x Populus tremuloides
Populus tremula x Populus tremuloides
Populus tremula x Populus tremuloides
Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids
; eurosids I; Malpighiales; Salicaceae; Populus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              75 bp mRNA s062E01 Populus imbibed seed cDNA library tremuloides cDNA 5 prime, mRNA sequence. BU866082
                              1 RGGCTAGCHACAAC 14
                                                                                                                                                                                                                                                                                                                                         Umea Plant Science Center
Department of Plant Physiology
University of Umea, 901 87 Umea,
                                                                                                                                                                                                                                                                                                                                                                                                                                            1 (bases 1 to 75)
Unneberg, P., Bhalerao, R.R., Jansson, S. and Sterky, F.
The poplar tree transcriptome: Analysis of expressed sequence tags
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1 RGGCTAGCHACAAC 14
                                                                                                                                                                                                                                                                       Email: rupali.bhalerao@plantphys.umu.se
Location/Qualifiers
                                                                                                                                                                                                                                                                                                       Tel: +46 90 786 5279
Fax: +46 90 786 6676
                                                                                                                                                                                                                                                                                                                                                                                              Contact: BHALERAO RUPALI R.
                                                                                                                                                                                                                                                                                                                                                                                                              Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     BU866082.1 GI:24056736
                                                                                                                                                                                                                                                                                                                                                                                                                          from multiple libraries
                                                                                   Similarity
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                                                                Conservative
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|mol_type="mcNA"
|mol_type="mcNA"
|/mol_type="mcNA"
|/db_xref="ntaxon:47664"
|/db_xref="taxon:47664"
|/tissue_type="imbibed seed"
|/close_Tib="Populus imbibed seed cDNA library"
|/close_Tib="Populus imbibed seed cDNA library"
|/close_Tib="Populus imbibed seed cDNA library"
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/lab_host="DH10B"
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                                                                                 70.0%;
78.6%;
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78.6%;
41
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Pred. No. 3.
                                                                                 Score 11.2; DB 13;
Pred. No. 4.2e+04;
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Populus tremula x Populus
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Public Soybean EST Project
Washington University School of Medicine
4444 Forest Park Parkway, Box 8501, St. I
Tel: 314 286 1800
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Glycine max (soybean)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Email: est@watson.wustl.edu
This clone is available through: ResGen, Invitrogen Corp. 2130
South Memorial Parkway Huntsville, AL 35801 For further information
call: (800)-533-4363 or contact: ccu@resgen.com web site:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Shoemaker, R., Keim, P., Vodkin, L., Brpelding, J., Coryell, V., Khanna, A., Bolla, B., Marra, M., Hillier, L., Kucaba, T., Martin, J., Beck, C. Wylie, T., Underwood, K., Steptoe, M., Theising, B., Allen, M., Bowers, Y., Person, B., Swaller, T., Gibbons, M., Pape, D., Harvey, N., Schur
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Bukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids; eurosids I; Fabales; Fabaceae; Papilionoideae; Phaseoleae;
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CA819431.1 GI:26268368
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      vector to vector length is 78 Seq primer: -40RP from Gibco.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Tel: 314 286 1800
Fax: 314 286 1810
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Contact: Shoemaker R/Public Soybean EST Project
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                                                                                                                               Similarity
                                               CTAGCHACAACG 15
CTAGCCACAACG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (bases 1 to 77)
                                                                                                                                                                                                                           /note="Wector: pSPORT1; Site 1: Not1; Site 2: Sal1; The cDNA library was constructed from mRNA isolated from immature pods (approximately 2cm long) of greenhouse grown plants. The library was prepared using the Life Technologies pSuperScript cDNA library construction kit. Complementary DNA was synthesized from mRNA using a poly(dT) sequence with a Not1 restrictions site. Sal1 linkers adapters were ligated to the blunt-ended cDNA fragments followed by Not1 digestion. The cDNA fragments were directionally cloned into the Not1-Sal1 restriction site of the pSpORT1 vector. The ligated cDNA fragments were transformed into E.coli ElectroMax DH10B host cells. This library was constructed in the laboratory of Dr. Lila Vockin by Ann Khanna at the University of Illinios at Urbana-Champaign. email: 1-vockin@uiuc.edu"
                                                                                                                                                                                                                                         18
                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     grown plants"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              tissue_type="immature pods (~2cm long) of greenhouse
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           organism="Glycine max"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                clone="SOYBEAN CLONE ID: Gm-c1071-7058"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   clone_lib="Gm-c1071"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  lab_host="DH10B"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         l_type="mRNA"
_xref="taxon:3847"
                                                                                                                            70.0%;
91.7%;
                                                                                                                               Score 11.2; DB 14
Pred. No. 4.3e+04;
                                                                                                         Mismatches
                                                                                                                                                           DB 14;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Louis, MO 63108,
                                                                                                      Indels
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RESULT 20

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VERSION
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AZ362937
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Best Local Similarity
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                                                                                                                                                                    5.
4.
AZ362937 92 bp DNA linear 1M0108B18F Mouse 10kb plasmid UUGC1M library Mus clone UUGC1M0108B18 F, genomic survey sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Fax: 314 286 1810
Email: mouseest@watson.wustl.edu
This clone is available royalty-free through LLNL; contact the
This clone is available royalty-free through further information.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Marra,M., Hillier,L., Allen,M., Bowles,M., Dietrich,N., Dubu
Geisel,S., Kucaba,T., Lacy,M., Le,M., Martin,J., Morris,M.,
Schellenberg,K., Steptoe,M., Tan,F., Underwood,K., Moore,B.,
Theising,B., Wylie,T., Lennon,G., Soares,B., Wilson,R. and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AA183068 85 bp mRNA linear EST 07-JAN-1997 mt86e09.rl Soares mouse lymph node NbMLN Mus musculus cDNA clone IMAGE:636808 5' similar to TR:G1203965 G1203965 BONE-DERIVED GROWTH
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Possible reversed clone: similarity on wrong strand
Seq primer: -28M13 rev2 from Amersham
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Washington University School of MedicineP
44444 Forest Park Parkway, Box 8501, St. Lo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The WashU-HHMI Mouse EST Project
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Mammalia; Eutheria; Rodentia; Sciurognathi, Muridae; Murinae; Mus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mus musculus
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     High quality sequence stop: 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Tel: 314 286 1800
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WashU-HHMI Mouse EST
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Contact: Marra M/Mouse EST Project
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Waterston, R
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           1 (bases 1 to 85)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    MGI:388800
                                                                                                                                                                                                                RGGCTAGCHACAAC 14
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                                                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                  19
                                                                                                                                                                                                                                                                                                                                                                                  ո
                                                                                                                                                                                                                                                                                                                                                                           3']; double-stranded cDNA was ligated to Eco RI adaptors (Pharmacia), digested with Not I and cloned into the Not and Eco RI sites of the modified pT7T3 vector. RNA provided by Dr. Bertrand Jordan. Library constructed and normalized by Bento Soares and M.Fatima Bonaldo."

26 c 21 g 19 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   /clone lib="Soares mouse lymph node NDMLN"
/note="Organ: lymph node; Vector: pT7T3D-Pac (Pharmacia)
with a modified polylinker; Site 1: Not I; Site 2: Eco RI;
ist strand cDNA was primed with a Not I - oligo(dT) primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /tissue_type="lymph node"
/dev_stage="4 weeks"
/lab_host="DH10B"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /mol_type="mRNA"
/strain="C57BL/6J"
/db_xref="taxon:10090"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         clone="IMAGE: 636808"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     sex="male"
                                                                                                                                                                                                                                                                                   70.0%;
78.6%;
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                                                                                                                                                                                                                                                           Score 11.2; DB 9;
Pred. No. 4.4e+04;
2; Mismatches 1;
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                                                                                                                                                                                                                                                                                                         Length
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                                                                                                                                                                                                                                                                  Indels
                                 musculus
                                                     GSS 02-OCT-2000
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JOURNAL COMMENT
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ORGANISM
       DEFINITION
                                                  BZ291268
                                                                        RESULT 22
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                                                                                                                                                                                                                                                             Local
                                                                                                                                              68
BZ291268 92 bp DNA linear GSS SALK_120055.25.10.x Arabidopsis thaliana TDNA insertion
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Email: ddunn@genetics.utah.edu
Insert Length: 10000 Std Error: 0.00
Plate: 0108 row: B column: 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      University of Utah Genome Center University of Utah Rm. 308, Biomedical Polymers Res
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1 (bases 1 to 92)
Dunn,D., Aoyagi,A., Barber,M., Beacorn,T., Duval,B., Hamil,C.,
Islam,H., Longacre,S., Mahmoud,M., Meenen,B., Pedersen,T., Reilly
,M., Rose,M., Rose,R., Stokes,R., Tingey,A., von Niederhausern,A.
and Wright,D., Weiss,R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Seq primer: CGTTGTAAAACGACGGCCAGT
Class: plasmid ends
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Tel: 801 585 5606
Fax: 801 585 7177
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AZ362937
AZ362937.1 GI:10476637
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Contact: Robert B.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          plasmid inserts
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mouse whole genome scaffolding with paired end reads from 10kb
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mammalia; Eutheria;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Bukaryota; Metazoa;
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                                                                                                                                                                                                                                                             Similarity
                                                                                                                                                                                         RGGCTAGCHACAAC 14
                                                                                                                                              GGGCTACCAACAAC 81
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308, .
7 USA
                                                                                                                                                                                                                                   70.0%; ilarity 78.6%; Conservative
                                                                                                                                                                                                                                                                                                                                                      21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           quality sequence stop: 92.
                                                                                                                                                                                                                                                                                                                                             Laboratory Mouse DNA Resource
(http://www.jax.org/resources/documents/dnares/). The DNA
was hydrodynamically sheared by repeated passage through a
0.005 inch orifice at constant velocity. The sheared DNA
0.005 inch orifice at constant velocity. The sheared DNA
was blunt end-repaired with T4 DNA polymerase and T4
polynucleotide kinase. Adaptor oligonucleotides were
ligated to the blunt ends in high molar excess. The
adaptored DNA was purified and size-selected for a 9.5 to
10.5 kb range using preparative agarose gel
electrophoresis. Vector DNA was prepared from a derivative
of pWD42 (gi|4732114|gb|AF129072.1), a copy-number
inducible derivative of plasmid R1. The vector was ligated
with adaptors complementary to the insert adaptors and
purified. The sheared, adaptored mouse DNA was ambealed to
adaptored vector DNA, and transformed into
chemically-competent E, coli XL10-Gold (Stratagene) cells
and selected for ampicillin resistance."
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       /lab_host="E. Coli strain XL10-Gold, Tl-resistant, F-"/Clone lib="Mouse 10kb plasmid UUGCIM library"/note="Vector: pWD42nv; Purified genomic DNA from M.musculus C57BL/6J (male) was obtained from the Jackson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   /mol_type="genomic DNA"
/strain="C57BL/6J"
/db_xref="taxon:10090"
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Rodentia;
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                                                                                                                                                                                                                                     Score 11.2; DB 28;
Pred. No. 4.6e+04;
2; Mismatches 1;
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. 4.6e+04;
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BU867160/c
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                         COMMENT
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              48
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       11;
                                                                                                                                                   Populus tremula x Populus tremuloides
Populus tremula x Populus tremuloides
Populus tremula x Populus tremuloides
Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Eukaryota; Magnoliophyta; eudicotyledons; core eudicots; roside
; eurosids I; Malpighiales; Salicaceae; Populus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           4
Contact: BHALERAO RUPALI R. Umea Plant Science Center
                                          from multiple libraries 
Unpublished
                                                                                                                                                                                                                                                                       EST
                                                                                                                                                                                                                                                                                                                                                            BU867160 95 bp mRNA linear EST 16-OCT-2002 S075A07 Populus imbibed seed cDNA library Populus tremula x Populus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            This is single pass sequence recovered from the left border of TDNA. This sequence lies within an annotated exon of At4g17970
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Tel: 858 453 4100 x1752 Fax: 858 558 6379 Email: ecker@salk.edu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Salk Institute Genomic Analysis Laboratory (SIGnAL)
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 92037, USA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Arabidopsis Genome 
Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Alonso,J.M., Leisse,T.J., Barajas,P., Chen,H., Cheuk,R.,,C., Jeske,A., Karnes,M., Kim,C.J., Parker,H., Prednis,L., Zimmerman,J. and Ecker,J.R.
A Sequence-Indexed Library of Insertion Mutations in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Bukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; eudicotyledona; core eudicots; rosids; eurosids II; Brassicales; Brassicaceae; Arabidopsis.

1 (bases 1 to 92)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Arabidopsis thaliana
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BZ291268
                                                                                 Unneberg, P., Bhalerao, R.R., Jar The poplar tree transcriptome:
                                                                                                                                                                                                                                                                                            BU867160.1 GI:24057814
                                                                                                                                                                                                                                                                                                                                       tremuloides
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Contact: Joseph R. Ecker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BZ291268.1 GI:24336251
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Similarity
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                                                                                                                                bases 1 to 95)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /clone="SALK_120055.25.10.x"
/clone lib="Arabidopsis thaliana TDNA insertion lines"
/note="PCR was performed on Arabidopsis thaliana lines
each of which contains one or more TDNA insertion
elements. The resultant fragment for each line was
directly sequenced to determine the genomic sequence at
the site of insertion. Details of the protocols used can
be found at http://signal.salk.edu/tdna_protocols.html"
a 32 c 17 g 18 t
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/mol_type="genomic DNA"
/strain="Columbia 0"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       db_xref="taxon:3702"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ocation/Qualifiers
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                                                                                                                                                                                                                                                                                                                                       CDNA 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          70.0%;
91.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              59
                                                                                                                                                                                                                                                                                                                                       prime, mRNA sequence
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Pred. No. 4.6e+04;
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                                                                                    Jansson,S. and Sterky,F
me: Analysis of expressed
                                                                                        expressed
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 92;
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Prednis, L., Shinn, I
                                                                                        sequence tags
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BASE COUNT
ORIGIN
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AUTHORS
TITLE
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BU862306/c
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ORIGIN
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                                                         RESULT 25
                                                                                                                                                           Query Match
Best Local S
Matches 11
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Best Local Similarity
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                                                                                                    46
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Tel: +46 90 786 5279
Fax: +46 90 786 6676
Email: rupali.bhalerao@plantphys.umu
Location/Qualifiers
1. .95
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Department of Plant Physiology
University of Umea, 901 87 Umea,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                               Unneberg, P., Bhalerao, R.R., Jansson, S. & The poplar tree transcriptome: Analysis from multiple libraries
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/clone_lib="ropulus imbibed
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1 (bases 1 to 100)

2 (bases 1 to 100)

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This sequence was derived from the FAPESP/LICR Human Cancer Genome
Project. This entry can be seen in the following URL
(http://www.ludwig.org.br/scripts/gethtml2.pl?tl=&t2=CMO-UM0042-020
300-261-e05&t3=2000-03-02&t4=1)
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Laboratory of Cancer Genetics
Ludwig Institute for Cancer Research
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/dev stage="Adult"
/clone lib="UM0042"
/note="Organ: uterus; Vector: puc18; Site_1: SmaI; Site_2:
/note="Organ: uterus; Vector: puc18; Site_1: SmaI; Site_2:
/note="Corgan: uterus; Vector: products derived from ORESTES PCR (U.S. Letters Patent application No. 196
- Ludwig Institute for Cancer Research) profiles
/note the pUC 18 vector: Reverse transcription of tissue mRNA and cDNA amplification were performed under low stringency conditions."

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Populus tremula x Populus tremuloides
Eukaryota, Viridiplantae, Streptophyta, Embryophyta, Tracheophyta,
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The University of Georgia, Department of Plant Biology
Plant Sciences Building, Rm. 2502, Athens, GA 30602-7271,
                                                                        Spermatophyta; Magnoliophyta; eudicotyledons; cc
; eurosids I; Malpighiales; Salicaceae; Populus.
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An EST database from (
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  The poplar tree transcriptome:
                    1 (bases 1 to 100)
Unneberg, P., Bhaler
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /clone_lib="Pathogen-infected compatible 1 (PIC1)"
/note="Vector: pBluescript II SK(-) from Lambda Zap II;
/note="Vector: pBluescript II SK(-) from Lambda Zap II;
Site 1: XhoI; Site 2: EcoRI; Four-week-old sorghum
seedlings were sprayed with spore suspension prepared from
3-week-old FRM421, a sorghum isolate of the anthracnose
pathogen Collectorichum graminicola. Inoculated plants
were kept in a 25 C dark growth chamber with 100% relative
humidity for 24 hr, followed by 12/12 hr of light/dark
cycle at 25 C with 90% relative humidity for another 24
hr. All leaves were harvested and quick frozen with liquid
nitrogen and stored in a -80 C freezer. The library was
made from poly-A RNA in the cloning vector lambda ZAP II.
Clones to be sequenced were prépared by mass excision.
WARNING: While most or all ESTs are expected to derive
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         from the host plant, no effort was made to eliminate ESTs deriving from the pathogen." 15 \ c \qquad 24 \ g \qquad 31 \ t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Colletotrichum graminicola"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     tissue_type="Leaves"/dev_stage="Leaves"/dev_stage="4-week-old seedlings infected with
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        cultivar="BTx623"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              db_xref="taxon:4558"
Bhalerao,R.R., Jansson,S. and Sterky,F. ree transcriptome: Analysis of expressed
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91.7%;
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Pred. No. 4.7e+04;
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RESULT 28
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                                                                                                                                                                                                                                                                                                                                                                    Talk Institute Genomic Analysis Laboratory (SIGnAL)
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA 92037, USA
Tel: 858 453 4100 x1752
Fax: 858 558 6379
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Alonso,J.M., Leisse,T.J., Barajas,P., Chen,H., Cheuk,R.,
C., Jeske,A., Karnes,M., Kim,C.J., Parker,H., Prednis,L
, Zimmerman,J. and Ecker,J.R.
A Sequence-Indexed Library of Insertion Mutations in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  GSS.
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Unpublished
Contact: BHALERAO RUPALI R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Spermatophyta; Magnoliophyta; eudicotyledons; core eud; eurosids II; Brassicales; Brassicaceae; Arabidopsis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledona; core eudicots; rosids
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CC179318
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Fax: +46 90 786 6676
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Department of Plant Physiology University of Umea, 901 87 Umea, Sweden
                                                                                                                                                                                                                                                                                          Class: TDNA tagged
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Contact: Joseph R. Ecker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Arabidopsis Genome
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                                                                                                                                                                                                                                                                                                                                This is single pass sequence recovered
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Email: rupali.bhalerao@plantphys.umu.se
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                                                                                                                                                                                                                                                                                                                                                      ecker@salk.edu
/db_xref="taxon:3702"
/clone="SALK 067813.35.30.x"
/clone="SALK 067813.35.30.x"
/clone="Example of the lines of the resultant fragment for each line was directly sequenced to determine the genomic sequence at the site of insertion. Details of the protocols used carbe found at http://signal.salk.edu/tdna_protocols.html"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       /organism="Populus tremula x Populus tremuloides"
|mol_type="mRNA"
|db_xref="taxon:47664"
|/tissue_type="imbibed seed"
|/clone_lib="Populus imbibed seed cDNA library"
| 29 c 20 g 29 t
                                                                                                                                                                                    organism="Arabidopsis"
/mol_type="genomic DNA'
/strain="Columbia 0"
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78.6%;
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Prednis, L., Shinn,
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RESULT 29
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TITLE
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Emericella nidulans
Emkaryota; Fungi; Ascomycota; Pezizomycotina; Euroti
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   044372 79 bp
ENU44372 Aspergillus nidulans cle
CDNA clone SE0877, mRNA sequence.
                                                                                     AA594999 82 bp mRNA linear BST 26-SEP-1997 no31e06.sl NCI CGAP Pr22 Homo sapiens cDNA clone IMAGE:1102306 3' similar to TR:G1234841 G1234841 LIM PROTEIN MLP. ;, mRNA sequence. AA594999
                                                                                                                                                                                                                                        N
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Quantitative analysis of gene expression in sexual Aspergillus nidulans by sequencing of 3'-directed (FEMS Microbiol. Lett. 138 (1), 71-76 (1996)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Chonju, 561-756, S. Korea
Tel: +82-652-70-3340
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Contact: Keon-Sang Chae
Chonbuk National University
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               8674973
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Lee,D., Lee,S., Hw
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 Bukaryota; Metazoa; Chordata;
Mammalia; Eutheria; Primates;
                                                                        AA594999.1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       +82-652-70-3345
                              sapiens
                                           sapiens (human)
                                                                                                                                                                                                                                                                                                                                              24
                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         chaeks@chonbuknms.chonbuk.ac.kr.
                                                                                                                                                                                                                                                                                                                                           /cell_type="Hull cell"
/dev stage="sexual"
/clome_lib="Aspergillus nidulans cleistothecium"
/note="3'-directed cDNA clomes; single-pass seque
/note="3'-directed cDNA clomes; single-pass seque
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                                                                                                                                                                                                                                                                                                                                                                                                                                   /db_xref="taxon:162425"
/clone="SE0877"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 strain="FGSC4"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            organism="Emericella nidulans"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ocation/Qualifiers
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Pred. No. 5.6e+04;
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s cleistothecium
Craniata; Vertebrata; Euteleostomi; Catarrhini; Hominidae; Homo.
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Emericella nidulans
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                                                                                                                                                                                    Glycine max
Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosid;
; eurosids I; Fabales; Fabaceae; Papilionoideae; Phaseoleae;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Insert Length: 968 Std Error: 0.00 Seg primer: -40m13 fwd. ET from Amersham High quality sequence stop: 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      CDNA Library Preparation: M. Bento Soares, Ph.D. CDNA Library Arrayed by: Greg Lennon, Ph.D. DNA Sequencing by: Washington University Genome Clone distribution: NCI-GGAP clone distribution found through the I.M.A.G.E. Consortium/LLNL at:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Email: cgapbs-r@mail.nih.gov
Tissue Procurement: Michael J. Brownstein, M.D.,
Emmert-Buck, M.D., Ph.D.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        NCI-CGAP http://www.ncbi.nlm.nih.gov/ncicgap.
National Cancer Institute, Cancer Genome Anat
Shoemaker, R., Keim, P., Vodkin, L., Erpelding, J., Coryell, V., A., Bolla, B., Marra, M., Hillier, L., Kucaba, T., Martin, J., I Wylie, T., Underwood, K., Steptoe, M., Theising, B., Allen, M., F., Person, B., Swaller, T., Gibbons, M., Pape, D., Harvey, N., R., Ritter, E., Kohn, S., Shin, T., Jackson, Y., Cardenas, M., P., Waterston, R. and Wilson, R.
                                                                                                                                                                                                                                                                                                                                                                                                     BE330980 100 bp mRNA so92a05.y1 Gm-c1041 Glycine max cDNA clone (Gm-c1041-777 5' similar to TR:Q42897 Q42897
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Trace considered overall poor quality Insert Length: 968 Std Error: 0.00
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                                                                                                                                                                                                                                                                                              Glycine max (soybean)
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                                                                                                                                                                                                                                                                                                                                                                                  ENZYME E2 ;, mRNA sequence.
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with a modified polylinker; 1st strand cDNA was prepared
from normal prostate bulk tissue, and was then primed with
a Not I - oligo(dT) primer. Double-stranded cDNA was
ligated to Eco RI adaptors (Pharmacia), digested with Not
I and cloned into the Not I and Eco RI sites of the
modified pT7T3 vector. Library is normalized, and was
constructed by Bento Soares and M. Fatima Bonaldo. "
a 25 c 21 g 13 t
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mol_type="mRNA"

db_xref="taxon:9606"
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clone_lib="NCI_CGAP_Pr22"
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80.0%;
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Pred. No. 5.7e+04;
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1 (bases 1 to 50)
1 (bases 1 to 50)
Suzuki,Y., Taira,H., Tsunoda,T., Mizushima-Sugano,J., Sese,J., Ha,H., Ota,T., Isogai,T., Tanaka,T., Morishita,S., Okubo,K., Sakaki,H., Nakamura,Y., Suyama,A. and Sugano,S.
Diverse transcriptional initiation revealed by fine, large-scale mapping of mRWA start sites
EMBO Rep. 2 (5), 388-393 (2001)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           AU106358
AU106358
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Trace considered overall poor quality This clone is available
through: ResGen, Invitrogen Corp. 2130 South Memorial Parkway
Huntsville, AL 35801 For further information call: (800)-533-4363
or contact via email: ccu@resgen.com
High quality sequence stop: 1.
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Washington University School of Medicine
4444 Forest Park Parkway, Box 8501, St. Louis, MO 63108, USA
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Contact: Shoemaker R/Public Soybean EST Project
Department of Virology
Institute of Medical Science, University of Tokyo
4-6-1, Shirokanedai, Minatoku, Tokyo 108-8639, Japan
Email: ysuzuki@ims.u-tokyo.ac.jp
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            HEP02980, mRNA
AU106358
                                                                                                                                                                                                                                                                                                                                                       Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens
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                                                                                              Contact: Yutaka Suzuki
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              primer. EcoRI adapters were ligated to the blunt-ended cDNA fragments followed by digestion with EcoRI and HindIII. The cDNA fragments were directionally cloned into the EcoRI-HindIII restriction site of the pT773-Pac vector. The ligated cDNA fragments were transformed into DH10B host cells. This library was constructed by Dr. Randy Shoemaker."

1 25 c 27 g 19 t
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/note="Vector: pT713Pac (Pharmacia); Site 1: EcoRI;
Site 2: HindIII; This library was constructed from mRNA
isolated from sensecing leaf tissue of mature greenhouse
grown plants of the cultivar Williams. Complementary DNA
was synthesized from mRNA using a 3' anchored poly(dT)
was synthesized from mRNA using a 3' anchored poly(dT)
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/db xref="taxon:3847"
/clone="GENOME SYSTEMS CLONE ID: Gm-c1041-777"
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                                                                  of Virology
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Pred. No. 6.1e+04;
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cDNA library Homo sapiens cDNA clone
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Best Local Similarity 85.7
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Alonso, J.M., Leisse, T.J., Barajas, P., Chen, H., Cheuk, R., C., Jeske, A., Karnes, M., Kim, C.J., Parker, H., Prednis, L., Zimmerman, J. and Ecker, J.R.
A Sequence-Indexed Library of Insertion Mutations in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Arabidopsis thaliana
Arabidopsis thaliana
Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta;
Eukaryota; Magnoliophyta; eudicotyledons; core eudicots; rosid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Tel: 858 453 4100 x1752 Fax: 858 558 6379
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Contact: Joseph R. Ecker
Salk Institute for Biological Studies
The Salk Institute for Biological Studies
10010 N. Torrey Pines Road, La Jolla, CA. 92037, USA
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BZ287687
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               BZ287687 72 bp DNA linear GSS SALK 021065.27.75.x Arabidopsis thaliana TDNA insertion Arabidopsis thaliana genomic clone SALK_021065.27.75.x,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Suzuki,Y., Yoshitomo-Nakagawa,K., Maruyama,K., Suyama,A. and Sugano,S. Construction and characterization of a full length-enriched and a 5'-end-enriched cDNA library. Gene 200 (1-2), 149-156 (1997).
                                                                                                                                                                                                                                                                                                                                                                                                                                               Class: TDNA tagged
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    This is single pass sequence recovered
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Arabidopsis thaliana (thale cress)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ecker@salk.edu
                                                                                                                      /db_xref="taxon:3702"
/clone="StALK 021055.27.75.x"
/clone="StALK 021055.27.75.x"
/clone="StALK 021055.27.75.x"
/clone="StALK 021055.27.75.x"
/clone="StALK 021055.27.75.x"
/clone="Board on the performed on Arabidopsis thaliana lines each of which contains one or more TDNA insertion elements. The resultant foreach line was directly sequenced to determine the genomic sequence at the site of insertion. Details of the protocols used can be found at http://signal.salk.edu/tdna_protocols.html"
a 12 c 14 g 24 t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /clone_lib="Sugano Homo sapiens cDNA library"
. 20 c 12 g 15 t
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/clone="HEP02980"
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mol_type="mRNA"
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                   Score 10.8; DB Pred. No. 7e+04; 0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Dunn, D., Aoyagi, A., Barber, M., Beacorn, T., Duval, B., Hamil, C., Islam, H., Longacre, S., Mahmoud, M., Meenen, E., Pedersen, T., Reilly, M., Rose, M., Rose, R., Stokes, R., Tingey, A., von Niederhausern, A. and Wright, D., Weiss, R. and Wright, D., Weiss, R. Mouse whole genome scaffolding with paired end reads from 10kb
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AZ619815 80 bp DNA linear GSS 13-DEC-20010100452D18F Mouse 10kb plasmid UUGCIM library Mus musculus genomic clone UUGCIM0452D18 F, genomic survey sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Seq primer: CGTTGTAAAACGACGGCCAGT
Class: plasmid ends
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University of Utah
Rm. 308, Biomedical
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Fax: 801 585 7177
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Contact: Robert B.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Unpublished
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         plasmid inserts
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                                                                                           10.5 kb range using preparative agarose gel electrophoresis. Vector DNA was prepared from a derivative of pWD42 (gi[4732114]gb[AF129072.1), a copy_number inducible derivative of plasmid R1. The vector was ligated with adaptors complementary to the insert adaptors and purified. The sheared, adaptored mouse DNA was annealed to adaptored vector DNA, and transformed into chemically-competent E. coli XL10-Gold (Stratagene) cells and selected for ampicillin resistance."
                                                                                                                                                                                                                                                                                                                                                  was hydrodynamically sheared by repeated passage through a 0.005 inch orifice at constant velocity. The sheared DNA was blunt end-repaired with T4 DNA polymerase and T4 polynucleotide kinase. Adaptor oligonucleotides were ligated to the blunt ends in high molar excess. The adaptored DNA was purified and size-selected for a 9.5 to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         /note="Vector: PWD42nv; Purified genomic DNA from M. musculus C57BL/6J (male) was obtained from the Jack
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (http://www.jax.org/resources/documents/dnares/). The DNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Laboratory Mouse DNA Resource
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         /lab_host="E. Coli strain XL10-Gold, T1-resistant, F-"
/clone_lib="Mouse_10kb_plasmid_UUGCIM_library"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      /mol_type="genomic DNA"
/strain="C57BL/6J"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                'sex="Male"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       clone="UUGC1M0452D18"
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Score 10.8; DB 28; Pred. No. 7.3e+04;
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26 AGGCTAGCAACA 37
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                                                                                       10;
                                         1 RGGCTAGCHACA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Zuechtungsforschung, Carl-von-Linne-Weg 10, Koeln, 50829, Germany This sequence is recovered from the left border of the T-DNA. It indicates an insertion close to or within gene At3g26560. The sequences are generated at the MPI for Plant Breeding Research in the context of the GABI-Kat project. GABI-Kat is part of the German Plant Genomics program designated 'GABI'. Information on line availability can be found at:

http://www.mpiz-koeln.mpg.de/GABI-Kat/.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ROSSO,M., Strizhov,N., Li,Y., Reiss,B., Dekker,K. and Weisshaar,B. A new Arabidopsis thaliana T-DNA mutagenised population (GABI-Kat) for flanking sequence tag based reverse genetics
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1 RGGCTAGCHACA 12
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Submitted (21-CCT-2002) Weisshaar B., Max-Planck-Institut fuer Zuechtungsforschung, Carl-von-Linne-Weg 10, Koeln, 50829, Germany
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         and Weisshaar,B.
A pipeline for automated high-throughput generation of FSTs (flanking sequence tags) from Arabidopsis thaliana T-DNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Eukaryota; Viridiplantae; Streptophyta; Embryophyta; Tracheophyta; Spermatophyta; Magnoliophyta; eudicotyledons; core eudicots; rosids; eurosids II; Brassicales; Brassicaceae; Arabidopsis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Arabidopsis thaliana (thale cress)
Arabidopsis thaliana
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Strizhov,N., Li,Y., Rosso,M., Viehoever,P., Dekker,K., Saedler,H.
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a 19 c
                                                                                                                                                                                                                                     Inote="PCR was performed on DNA from Arabidopsis thaliana plants (T1) which were transformed with the T-DNA from vector pxc161. The lines contain one or more T-DNA insertions. The DNA fragment(s) resulting from the PCR were directly sequenced to determine the genomic sequence flanking the insertion. Sequences displaying significant similarity to the A. thalaina nuclear genome sequence were processed for submission. T-DNA derived sequences were
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          /mol_type="genomic I
/strain="Columbia 0"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               organism="Arabidopsis thaliana"
/mol_type="genomic DNA"
                                                                                                                                                                                                                                                                                                                                                                                                                       clone_lib="Arabidopsis thaliana T-DNA insertion lines"
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Pred. No. 7.5e+04;
2; Mismatches 0
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BZ291056
BZ291056.1
GSS.
                                                                         BZ291056 94 bp DNA linear GSS 24-OCT-2002 SALK 112368.45.85.x Arabidopsis thaliana TDNA insertion lines Arabidopsis thaliana genomic clone SALK_112368.45.85.x, genomic
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                                                                                                                                                                                                                                                                                                      to;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Marra,M., Hillier,L., Allen,M., Bowles,M., Dietrich,N., Dubuque,T., Geisel,S., Kucaba,T., Lacy,M., Le,M., Martin,J., Morris,M., Schellenberg,K., Steptoe,M., Tan,F., Underwood,K., Moore,B., Theising,B., Wylie,T., Lennon,G., Soares,B., Wilson,R. and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Contact: Marra M/Mouse EST Project
WashU-HHMI Mouse EST Project
Washington University School of Medicinep
4444 Forest Park Parkway, Box 8501, St. Lo
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Email: mouseest@watson.wustl.edu
This clone is available royalty-free through LLNL ; contact the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Unpublished
                                                          survey sequence.
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                                                                                                                                                                                                                        GGGCTAGCCACA 85
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314 286 1810
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Location/Qualifiers
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                                                                                                                                                                                                                                                                                                                                                                                                     double-stranded cDNA was size selected, ligated to Eco RI adapters (Pharmacia), digested with Not I and cloned into the Not I and Eco RI sites of a modified pTT3 vector (Pharmacia). Library went through one round of normalization to a Cot = 5. Library constructed by Bento Soares and M.Fatima Bonaldo. RNA was kindly provided by Dr. Minoru Ko (Mayne State University)."
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               /dev_stage="19.5 dpc total fetus"
/lab_host="DH10B (ampicillin resistant)"
/clone_lib="Soares p3NWF19.5"
/note="Vector: pT7T3D (Pharmacia) with a modified
polylinker; Site_1: Not I; Site_2: Eco RI; 1st strand cDNA
was primed with a Not I - oligo(dr) primer [5]
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    /organism="Mus musculus"
/mol_type="mRNA"
/db_xref="taxon:10090"
/clone="IMAGE:335474"
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                     GI:24335637
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83.3%;
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Marra, M., Hillier, L., Allen, M., Bowles, M., Dietrich, N., Dubuque, T., Geisel, S., Kucaba, T., Lacy, M., Le, M., Martin, J., Morris, M., Schellenberg, K., Steptoe, M., Tan, F., Underwood, K., Moore, B., Theising, B., Wylie, T., Lennon, G., Soares, B., Wilson, R. and
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12; Conserv
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WashU-HHMI Mouse EST Project
Washington University School of MedicineP
4444 Forest Park Parkway, Box 8501, St. Lo
                                                                      Unpublished Contact: Marra M/Mouse EST Project
                                                                                                                    Waterston, R.
The WashU-HHMI Mouse EST Project
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AA919502 95 bp mRNA linear EST 20-APR-19vz20g11.r1 Stratagene mouse heart (#937316) Mus musculus cDNA clo
IMAGE:1316324 5' similar to TR:Q60961 Q60961 MEMBRANE TRANSPORTER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Unpublished
Contact: Joseph R. Ecker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ,C., Jeske,A., Karnes,M., Kim,C.J., Parker,H., Prednis,L, Zimmerman,J. and Ecker,J.R.
A Sequence-Indexed Library of Insertion Mutations in the
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Arabidopsis thaliana
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/clone lib="Arabidopsis thaliana TDNA insertion lines"
/clone lib="Arabidopsis thaliana TDNA insertion lines
/note="PCR was performed on Arabidopsis thaliana lines
each of which contains one or more TDNA insertion
elements. The resultant fragment for each line was
directly sequenced to determine the genomic sequence at
the site of insertion. Details of the protocols used co
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/strain="Columbia 0"
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85.7%;
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       MO 63108
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This clone is available royalty-free through LLNL; contact the
IMAGE Consortium (info@image.llnl.gov) for further information.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Tel: 314 286 1800
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1 (bases 1 to 32)
Dunn,D., Aoyagi,A., Barber,M., Beacorn,T., Duval,B., Hamil,C., Islam,H., Longacre,S., Mahmoud,M., Meenen,E., Pedersen,T., Reilly,M., Rose,M., Rose,R., Stokes,R., Tingey,A., von Niederhausern,A. and Wright,D., Weiss,R. Mandel Mouse whole genome scaffolding with paired end reads from 10kb Mouse whole genome scaffolding with paired end reads from 10kb resulting the state of the scaffolding with paired and reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resulting the scaffolding with paired end reads from 10kb resul
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University of Utah Genome
University of Utah
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                                                      High quality sequence stop: 32.
Location/Qualifiers
                                                                                                                                                                                                                                                                                                          Email: ddunn@genetics.utah.edu
Insert Length: 10000 Std Error:
Plate: 0501 row: D column:
                                                                                                                                                                                                                                             Seq primer: CGTTGTAAAACGACGGCCAGT
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Novel SAGE tags represent a significant number of novel genes in Drosophila genome
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Drosophila melanogaster
Eukaryota; Metazoa; Arthropoda; Hexapoda; Insecta; Pterygota;
Neoptera; Endopterygota; Diptera; Brachycera; Muscomorpha;
Ephydroidea; Drosophilidae; Drosophila.
Email: swangl@midway.uchicago.edu
This EST was detected from Drosophila melanogaster cDNA Library
with GLGI technique (Generation of Longer cDNA fragments from SAG
tags for Gene Identification, Proc. Natl. Acad. Sci. USA 97, 349,
2000; A high-throughput GLGI procedure for converting a large
number of SAGE tag sequences into 3' ESTs, Genes, Chromosomes &
cancers 33:252-261, 2002), which covers from the 3' end of cDNA
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5841 S. Maryland Ave., MC2115, Chicago, IL 60637, USA
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                                                                                                                                                                                                                                                                                                                                  Tel: 773-702-6788
Fax: 773-702-3002
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Seq primer: M13 Forward.

FEATURES

Source

1. .37

Location/Qualifiers

1. .37

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/db xref="Taxon:727"
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/clone 1ib="Drosophila melanogaster cDNA Library"

BASE COUNT

7 a

9 c

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Ouery Match
Best Local Similarity 84.6%; Pred. No. 7e+04;
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Matches 11; Conservative 1; Mismatches 1; Indels 0; Gaps 0;

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Search completed: January 21, 2004, 08:16:38

Job time: 1412 secs
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                     29-APR-1998;
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                                        W09849346-A1
                                                        Enzyme; catalysis; cleavage; target; pharmaceutical; medical; substrate;
regulator; detergent; dental hygiene; meat tenderiser; ss.
                                                                      Enzymatic DNA
                                                                                05-MAR-1999
                                                                                         AAV82954;
                                                                                                 AAV82954 standard;
   (SCRI ) SCRIPPS RES INST.
                                                                                                                                     (first
                                                                      core motif region 10-23.
                                                                                                                                     97US-0045228
                     98WO-US08677
                                                                                                 DNA;
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Matches 16
                                           Breaker RR,
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                                                                                       WO9849346-A1
                                                                                                Synthetic
                                                                                                         Enzyme; car
regulator;
                                                                                                                               05-MAR-1999
                                                                                                                                        AAV82953;
                                                                                                                                                                                                                                                                                          Claim
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produced by picornaviruses, hepadnaviridae, (e.g. HBV, HCV), papitiomaviruses (e.g. HPV), gammaherpesviruse(e.g. EBV), lymphocryptoviruses, leukemia viruses (e.g. HTLV-1 and -11), flaviviruses, togaviruses, herpesviruses (including alphaherpesviruse and betaherpesviruses), cytomegaolviruses (CMV), influenza viruses and viruses and retroviruses contributing to immunodeficiency diseases and syndromes (e.g. HiV-1 and -2), simian and feline immunodeficiency viruses and bovine leukemia viruses. They can also be used as regulators
                                                   New catalytic DNA molecules - having activity in a substrate nucleic acid, nucleic acid sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  This sequence is used in a method which involves the production of catalytic DNA molecules which can be used for cleaving target nucleic acid molecules. Such DNA molecules used in pharmaceutical and medical products (e.g. for wound debridement, clot dissolution), as well as in household items (e.g. detergents, dental hygiene products, meat tenderisers). Other suitable substrates include those comprising or
                        Claim 1; Page 96; 161pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New catalytic DNA molecules - having site-specific endonuclease activity in a substrate nucleic acid, used for cleaving target nucleic acid sequences
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAV82953 standard; DNA; 16 BP
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                                                                                                                 WPI; 1999-034670/03.
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                                                                                                                                                                                                                                                                                                                                                   catalysis; cloor; detergent;
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nt; dental
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hygiene; meat tenderiser; ss.
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Pred. No.
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                                                                   site-specific endonuclease
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                                                                                                                                                                      The present invention relates to a method for identifying sites on a target RNA which are accessible to pairing by antisense DNA, ribozymes of DNAzymes. The present sequence is a DNAzyme catalytic core sequence. In the method of the present invention the target sequence is incubated with DNAzymes, antisense oligonucleotides or ribozymes (such as the
                                                                                                                                                                                                                                                                                                                                                                                                                            Identifying sites on a target or in vitro-synthesized RNA accessible antisense, ribozyme, or DNAzyme binding comprises incubating hybridizing the target RNA with an antisense oligodeoxynucleotides,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  flaviviruses, togaviruses, herpesviruses (including alphaherpesviruse and betaherpesviruses), cytomegaolviruses (CMV), influenza viruses, viruses and retroviruses contributing to immunodeficiency diseases and syndromes (e.g. HiV-1 and -2), simian and feline immunodeficiency viruses and bovine leukemia viruses. They can also be used as regulators
                                                     present sequence). Any antisense oligonucleotide, ribozyme or DNAzym which is complementary to an accessible site in the target sequence hybridises to that site and the sequence is cleaved. The cleavage products can then be detected to identify the accessible binding sit
                                                                                                                                                                                                                                                                                                                                            Disclosure; Page 7; 38pp; English.
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                                   ABA02749;
                                                                                                                                                                                                       Sequence
                                                                                                                                                                                                                             present sequence). Any antisense oligonucleotide, ribozyme or DNAzyme which is complementary to an accessible site in the target sequence hybridises to that site and the sequence is cleaved. The cleavage products can then be detected to identify the accessible binding sites
                                                                                                                                                                                                                                                                        DNAzymes. The present sequence is a DNAzyme catalytic core sequence In the method of the present invention the target sequence is incubwith DNAzymes, antisense oligonucleotides or ribozymes (such as the
                                                                                                                                                                                                                                                                                                                                                                   Identifying sites on a target or in vitro-synthesized RNA accessible to antisense, ribozyme, or DNAzyme binding comprises incubating hybridizing the target RNA with an antisense oligodeoxynucleotides, ribozymes or DNAzymes -
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                                                         ABA02749 standard;
                                                                                                                                                                                                                                                                                                          target RNA which are accessible to pairing by antisense DNA, ribozymes or
                                                                                                                                                                                                                                                                                                                         The present invention relates to a method for identifying sites on
                                                                                                                                                                                                                                                                                                                                              Disclosure; Page 7; 38pp; English.
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RESULT 6
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Matches 15
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                                    WO200157206-A2
                                                               Unidentified
                                                                                      Human; checkpoint kinase-1; Chk1; antisense; RNA cleavage; cancer; ss.
                                                                                                                               DNAzyme ribozyme motif SEQ ID NO: 3186.
                                                                                                                                                           09-OCT-2001
                                                                                                                                                                                    AAH97756;
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                                                                                                                                                                                                                                                                                                                                                                                        Sequence 16
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28-FEB-2000; 2000US-185516P.
06-MAR-2000; 2000US-187128P.
                                                                                                                                                                                                                              inflammatory arthropathy; central nervous system injury; cerebrovascular accident; CVA; Alzheimer's disease; multiple sclehenotherapy-induced neuropathy; amyotrophic lateral sclerosis; Parkinson's disease; ataxia; Huntington's disease; Creutzfeldt-Jakob disease; muscular dystrophy; neurodegenerative
                                                                                                                                                                                                                                                                                                       Human; ss; antisense therapy; cytostatic; antiinflammatory; haemostatic; cerebroprotective; nootropic; neuroprotective; antiparkinsonian; cerebroprotective; nootropic; neuroprotective; antiparkinsonian; muscular; CD20; neurite growth inhibitor gene; NOG0; hammerhead ribozyme. DNAzyme; inozyme; G-cleaver; amberzyme; zinzyme; lymphoma; leukaemia; B-cell lymphoma; non-Hodgkin's lymphoma; NHL; lymphocytic leukaemia; human immunodeficiency virus; HIV associated NHL; mantle-cell lymphoma; MCL; immunocytoma; IMC; immune thrombocytopaenia; stroke; dementia;
                                                                                                        09-FEB-2001; 2001WO-US04273
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                                                                                                                                                                                                                                                                                                                                                                                                                                        DNAzyme motif.
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(RIBO-) RIBOZYME PHARM INC (BLAT/) BLATT L.
                                                                                                                                      16-AUG-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     12-MAR-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 8;
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(FATT/) FATTAEY A R.
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93.8%;
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Human; chloride channel calcium activated 1; CICA1; ss; antiasthmatic; antiinflammatory; chronic obstructive pulmonary disease; COPD; asthma; chronic bronchitis; cystic fibrosis; obstructive bowel syndrome; oxygen therapy; bronchodilator; corticosteroid; vaccination; mucokinet acetylcysteine.
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                                                                                                                                                                                                                            Human CLCA1 gene enzymatic nucleic acid
                                                                                                                                                                                                                                                                                                         02-JUL-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                    ABK61076 standard; DNA; 16 BP
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Pred. No. 8
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                                                                                                                                                                                                                                                                                                                                                                                                           Best Loc
Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
Human; hammerhead ribozyme; cytostatic; antitumour; antidiabetic; ophthalmological; antitarthritic; antipsoriatic; virucide; osteopathic; vulnerary; cancer; lymphoma; Ewing's Barcoma; melanoma; psoriasis; tumour anglogenesis; diabetic retinopathy; macular degeneration; neovascular glaucoma; myopic degeneration; arthritis; verruca vulgaris; angiofibroma of tuberous sclerosis; port-wine stain; wound healing; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; leukaemia; ss; Osler-Weber-rendu syndrome, leukaemia; osteoporosis; DNAzyme; inozyme;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Enzymatic polynucleotide that down regulates expression of chloride channel calcium activated gene, useful for treating Chronic obstructive pulmonary disease (COPD), chronic bronchitis and asthma
                                                                                                                                                        DNAzyme motif
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence
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nilarity 93.8%;
Conservative
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RESULT 10
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                                                                                                                                                                                                                                                                                                     Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                              Sequence 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              neovascular glaucoma, myopic degeneration, arthritis, psoriasis, verruca vulgaris; angiofibroma of tuberous sclerosis, port wine stains, Sturge
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  conditions selected from cancer, lymphoma, Ewing's sarcoma, melar tumour angiogenesis, diabetic retinopathy, macular degeneration, neovascular glaucoma, myopic degeneration, arthritis, psoriasis,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates to a nucleic acid molecule (I) which down regulates expression of an Ets_related gene (ERG). (I) is useful for treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Disclosure; Figure 5; 149pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  degeneration, arthritis, psoriasis, verruca vulgaris and Sturge Weber
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Novel polynucleotide which down regulates expression of Ets-related gene, useful for treating cancer, diabetic retinopathy, macular
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               Necrosis factor kappa B (NFKB) modulating DNAzyme motif
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                                                       03-JUN-2003
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                                                                                             ACA10109
                                                                                                                                ACA10109 standard; DNA; 16 BP
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Pred. No. 89;
1; Mismatches
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G-cleaver; amberzyme; cancer; REL-A activity; breast cancer; lung cancer; prostate cancer; colorectal cancer; brain cancer; cesophageal cancer; stomach cancer; bladder cancer; pancreatic cancer; cervical cancer; head and neck cancer; brain cancer; melanoma; multidrug resistant cancer; REL-A-specific inhibitor; chemotherapy; paclitaxel; docetaxel; cisplatin; methotrexate; cyclophosphamide; doxorubin; fluorouracil carboplatin; eathrea; diabetes; cyclophosphamide; doxorubin; fluorouracil carboplatin; dathrexate; gencitabine; radiation therapy; inflammatory disease; asthma; diabetes; rheumatoid arthritis; restenosis; Crohn's disease; obesity; ischaemia; gene therapy; autoimmune disease; lupus; multiple sclerosis; sepsis; transplant/graft rejection; reperfusion injury; glomerulonephritis; allergic airway inflammation; inflammatory bowel disease; infection;
chemotherapy including pacilitaxel, docetaxel, cisplatin, methotrexate, cyclophosphamide, doxorubin, fluorouracil carboplatin, edatrexate, gencitabine or radiation therapy. The enzymatic and antisense nucleic acid molecules are also useful for treating inflammatory disease such as rheumatoid arthritis, restenosis, asthma, Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, gene therapy applications, ischaemia/reperfusion injury (central nervous system (CNS) and myocardial), glomerulonephritis, sepsis, allergic airway inflammation, inflammatory bowel disease or infection. This sequence represents a motif of an enzymatic nucleic acid used to modulate the function of a necrosis factor kappa B sub-unit.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           cancer and is useful for down-regulating REL-A activity in a cell, for treating a patient having a condition associated with the level of REL-A. (1) is useful for cleaving RNA comprising a sequence of REL-A gene, in the presence of a divalent cation, especially Mg'2'+. The enzymatic and antisense nucleic acid molecules are useful for treating breast, lung, prostate, colorectal, brain, oesophageal, stomach, bladder, pancreatic, cervical, head and neck, ovarian cancer, melanoma, lymphoma, glioma or multidrug resistant cancer. The method involves use of other drug therapies such as monoclonal antibodies, REL-A specific inhibitors or the context of the context o
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       15-AUG-1994;
07-DEC-1992;
18-MAY-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention describes an enzymatic nucleic acid molecule (I) which down regulates expression of a sequence encoding a subunit of nuclear factor kappa B (NFKB), where (I) is an inozyme, zinzyme, G-cleaver or amberzyme configuration. The enzymatic nucleic acid molecule is adapted to treat
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Novel enzymatic nucleic acid molecules which down regulates expression of a sequence encoding a subunit of nuclear factor kappa B useful for treating cancer, inflammatory disorders and autoimmune diseases
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2003-340953/32.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           23-MAY-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                28-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      US2002177568-A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Enzymatic nucleic acid; nuclear factor kappa B; NFKB; inozyme; zinzyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Fig 4; SEQ ID
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (STIN/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        23-DEC-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          STINCHCOMB D T.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            MCSWIGGEN J
DRAPER K G.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         2001US-0864785.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        NO 3928; 72pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                94US-0291932.
92US-0987132.
94US-0245466.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               96US-0777916
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Draper
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Best Local Similarity Matches 15; Conserv

Conservative

92.5%; 4 C; 4

Score 14.8; Di Pred. No. 89; 1; Mismatches

DB 25; . ;

Length Indels

16; 0

Gaps

0

Query Match

Sequence 16

BP; 5

A

G; 2 T; 1 other;

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Car - sexes

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ARESULT 11
ARESA 432
ID ARESA 432
ID ARESA 432
ID ARESA 432
AC ARESA ARESA ARESA ARESA ACA ARESA ARESA ARESA ARESA ACA ARESA ARES
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                                                                                                                                                                                                                                                                                The present sequence is an example of a DNAzyme, an enzymatic conclear acid (ENA) that does not require the presence of a 2'-OH CC group for its activity. DNAzymes can be used as the ENA moiety in convel ENA peptide conjugates (I) of the invention that facilitate convel ENA peptide conjugates (I) of the invention that facilitate convel ENA peptide part of the conjugate is typically a fusogenic peptide such as a peptide given in ABP72395. The conjugates can be used to treat a cancer patient, where the cancer is breast, lung, colorectal, brain, oesophageal, stomach, bladder, pancreas, cervix, concertal and neck or ovary cancer, melanoma, lymphoma, glioma or control of the virus is HIV, hepatitis B virus, herpes simplex virus, cytomegalovirus, Rous sarcoma virus, herpes simplex virus, Ebola colorectal, influenza virus or papilloma virus (all colaimed). (I) are useful for introducing nucleotides, proteins cond/or non-nucleosidic small molecules into a cell and to detect the presence of a target molecules into a cell and to detect condiminations, cell or cell lysate. They are useful as diagnostic tools condiminations, cell or cell or diff and mutations within diseased cells or to detect the presence of a disease-related RNA in a cell.
                                                                                                                   Matches
                                                                                                                                                Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New transporter compounds useful for delivering molecules into biological system such as cells, and for treating cancer and vinfections -
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DNAzyme; enzymatic nucleic acid; enzyme; transporter; delivery; cytostatic; virucide; gene therapy; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                08-MAY-2003
                                                                                                                                                                                                                                       Sequence 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure; Fig 4; 88pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Beigelman L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   20-JUL-2001; 2001US-306995P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              30-JAN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DNAzyme motif.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ABZ58432;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ABZ58432 standard; DNA; 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            22-JUL-2002; 2002WO-US23324.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WO2003008628-A2
                                                                                                                   15;
                                                                                                                                                   Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    RGGCTAGCHACAACGA 16
                                                     RGGCTAGCHACAACGA 16
                                                                                                                   Conservative
                                                                                                                                                                                                                                       BP; 5 A; 4 C; 4 G; 2 T; 1 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Azhayev A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first
                                                                                                                                         92.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Azhayeva
                                                                                                                                                Score 14.8;
Pred. No. 89
                                                                                                                   Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                M
V
                                                                                                                                                                            BG
                                                                                                                                                                            25;
                                                                                                                0;
                                                                                                                                                                         Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         cancer and viral
                                                                                                                Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     gurb
                                                                                                                                                                            16;
                                                                                                                0
                                                                                                                Gaps
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RESULT 13
ABZ66527
ID ABZ66
XX
AC ABZ66
XX
DT 21-M2
XX
DE Humar
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ABZ66525
                                                                                                                                                                                                                                                                      멼
                                                                                                                                                                                  8
                                                                                                                                                                                                               Matches
                                                                                                                                                                                                                             Query Match
Best Local
                                                                                                                                                                                                                                                                                                          The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HERZ, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HERZ, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ64543, ABZ65532 - ABZ65519, ABZ66525 - ABZ66529, ABZ66528 - ABZ66528 represent human ribozymes of the
Human HER2 synthetic DNAzyme
                             21-MAR-2003
                                                                                   ABZ66527
                                                                                                                                                                                                                                                                    Sequence 27 BP; 6 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     29-MAY-2001; 2001US-294140P.
06-JUN-2001; 2001US-296249P.
10-SEP-2001; 2001US-318471P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human HER2 synthetic DNAzyme
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ABZ66525;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ABZ66525 standard; RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 3; Page 153; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2003-140484/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              29-MAY-2002; 2002WO-US16840
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           05-DEC-2002.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            enzymatic
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                                                                                                                                                                                                              14;
                                                                                                                                                        σ
                                                                                                                                                                        1 RGGCTAGCHACAACGA 16 : | | | | | | | | | | |
                                                                                                                                                                                                                           Similarity
                                                                                   standard;
                                                                                                                                                      AGGCTAGCTACAACGA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            nucleic acid;
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                                                                                                                                                                                                               Conservative
                           (first entry)
                                                                                   RNA;
                                                                                                                                                                                                                       92.5%;
87.5%;
                                                                                                                                                                                                                                                                      6 C; 10 G; 2 T; 3 U; 0 other;
                                                                                   27
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         H-Ras; N-Ras; HIV; cytostatic; anti-HIV,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        27
                                                                                                                                                        21
                                                                                                                                                                                                              2
                                                                                                                                                                                                                             Score 14.8;
Pred. No. 92
                                                                                                                                                                                                                           Pred.
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                                                                                                                                                                                                               Mismatches
                                                                                                                                                                                                                              92;
                                                                                                                                                                                                                                           DB 25;
                                                                                                                                                                                                               0;
                                                                                                                                                                                                               Indels
                                                                                                                                                                                                                                          Length
                                                                                                                                                                                                                                           27;
                                                                                                                                                                                                               0,
                                                                                                                                                                                                              Gaps
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RESULT 14
AAZ34361
ID AAZ34
XX AAZ34
XX AAZ34
XX L14-DE
XX Nucle
XX Catal
KW mutat
KW probe
XX Synth
XX W0995
PN W0995
XX
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                                                                                                                                                                                                                                                                                                                                              S
                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
                                                                                                                                                                                                                                                                                                                                                                            Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras s, N-Ras human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ66217 - ABZ66583 represent human ribozymes of timestric.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
              07-OCT-1999
                                           WO9950452-A1
                                                                      Synthetic.
                                                                                                  probe; cancer;
                                                                                                                 Catalytic nucleic acid-based diagnostic method; determination; AIDS; mutation; ribozyme; target; cleavage; amplification; PCR primer;
                                                                                                                                                         Nucleic acid-based diagnostic exemplification oligonucleotide
                                                                                                                                                                                                                                               AAZ34361 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 3; Page 153; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2003-140484/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mcswiggen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        29-MAY-2001;
06-JUN-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   29-MAY-2002; 2002WO-US16840
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                05-DEC-2002
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                                                                                                                                                                                       14-DEC-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            10-SEP-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (RIBO-) RIBOZYME
                                                                                                                                                                                                                                                                                                                                                                            14;
                                                                                                                                                                                                                                                                                                                                           1 RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                           Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                     27
                                                                                                                                                                                                                                                                                                                   AGGCTAGCTACAACGA 21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ; 2001US-294140P.
; 2001US-296249P.
; 2001US-318471P.
                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                     BP; 11 A; 8 C; 6
                                                                                                                                                                                       (first
                                                                                                    human immune deficiency virus; cystic fibrosis; HIV; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 PHARM INC
                                                                                                                                                                                                                                               DNA;
                                                                                                                                                                                       entry)
                                                                                                                                                                                                                                                                                                                                                                                          92.5%;
                                                                                                                                                                                                                                                29
                                                                                                                                                                                                                                                ВP
                                                                                                                                                                                                                                                                                                                                                                            2;
                                                                                                                                                                                                                                                                                                                                                                                          Score 14.8;
Pred. No. 92;
                                                                                                                                                                                                                                                                                                                                                                                                                                     G; 2 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                              Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                        DB
                                                                                                                                                                                                                                                                                                                                                                                                        25;
                                                                                                                                                                                                                                                                                                                                                                            0
                                                                                                                                                                                                                                                                                                                                                                                                       Length
                                                                                                                                                                                                                                                                                                                                                                              Indels
                                                                                                                                                                                                                                                                                                                                                                                                        27;
                                                                                                                                                                                                                                                                                                                                                                              <u>,,</u>
                                                                                                                                                                                                                                                                                                                                                                              Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                N-Ras,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                the
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present invention describes a method for determining whether a combined is afflicted with a disorder characterised by the presence of the known nucleic acid. The method comprises: (i) amplifying, in an completed sample from the subject, the nucleic acid segment that, in an comprise sequence present in either the mutated or wild-type segments, that a complete sequence present in either the mutated or wild-type segments, the nucleic acid segment that, in an complete sequence present in either the mutated or wild-type segments, the nucleic acid segment that, in an complete sequence present in either the mutated or wild-type segments, the nucleic sequence of the nucleic acid segment that, in an complete sequence of the nucleic acid or wild-type segments, the nucleic segments of the nucleic segments of the nucleic segment segments. The nucleic segments of the nucleic acid segment segments, the nucleic segments of the present oligonucleotide compounds. AAZ34339 to AAZ34450 represent oligonucleotide compounds and the exemplification of the present invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Best Loc
Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
                                                                                                                                                                                                                                            Catalytic nucleic acid-based diagnostic method; determination; AIDS; mutation; ribozyme; target; cleavage; amplification; PCR primer; probe; cancer; human immune deficiency virus; cystic fibrosis; HIV; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Detecting diseases associated with a known mutation by amplification and cleavage with catalytic nucleic acids, particularly for cancer, human immune deficiency virus and cystic fibrosis
                                                                                                                                                                                                                                                                                                                    Nucleic acid-based diagnostic exemplification oligonucleotide #25.
                                                                                                                                                                                                                                                                                                                                                                                                                          AAZ34363 standard; DNA; 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 29 BP; 10 A; 5 C; 10 G; 3 T; 1 other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 1999-591332/50
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             27-MAR-1998;
                                                                27-MAR-1998;
                                                                                                                                       07-OCT-1999.
                                                                                                                                                                          WO9950452-A1.
                                                                                                                                                                                                             Synthetic
                                                                                                                                                                                                                                                                                                                                                     14-DEC-1999
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                                                                                                   16-MAR-1999;
                             (JOHJ ) JOHNSON & JOHNSON RES PTY LTD.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    14;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1 RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                     (first entry
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             98US-0079651.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                99WO-IB00848
                                                                  98US-0079651.
                                                                                                    99WO-IB00848
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 92.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Cairns MJ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                23
                                                                                                                                                                                                                                                                                                                                                                                                                            ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 14.8;
Pred. No. 9:
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       93;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 20;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           29;
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Todd AV,

Fuery CJ,

Cairns MJ

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Matches
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Detecting diseases associated with a known mutation by amplification and cleavage with catalytic nucleic acids, particularly for cancer, human immune deficiency virus and cystic fibrosis -
                                Real-time quantitative amplification of nucleic acid, useful detecting bacterial pathogens, uses primer and labeled probe combine to form a ribozyme -
                                                                                                                                                                                               26-MAR-1999;
                                                                                                                                                                                                                                                                                                                                 Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                               Hammerhead ribozyme DNA motif #23
                                                                                                                                                                                                                                                                                                                                                                                                                                                13-MAR-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAC82623;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAC82623 standard; DNA; 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 29 BP; 7 A; 10 C; 5 G; 7 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Disclosure; Page 20; 57pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 1999-591332/50
Disclosure; Fig 13; 39pp; German
                                                                                                 WPI; 2000-603196/58.
                                                                                                                              Krupp G;
                                                                                                                                                                  (ARTU-) ARTUS
                                                                                                                                                                                                                               26-MAR-1999;
                                                                                                                                                                                                                                                                 28-SEP-2000.
                                                                                                                                                                                                                                                                                                  DE19915141-A1
                                                                                                                                                                                                                                                                                                                                                               fluorescent signal; cleavage;
                                                                                                                                                                                                                                                                                                                                                                               Detection; amplification; pathogenic bacteria; hammerhead ribozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The present invention describes a method for determining whether a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                14;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1 RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AGGCTAGCTACAACGA 24
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                  GES
                                                                                                                                                                                                  99DE-1015141.
                                                                                                                                                                                                                                 99DE-1015141
                                                                                                                                                                  MOLEKULARBIOLOGISCHE DIAGNOSTI
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            92.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               20;
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RESULT 17
ABZ66526
ID ABZ66
XX
AC ABZ66
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CCXSXXIII
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         This invention describes a novel method for the amplification and CC quantitative real-time determination of nucleic acid (I) using a primer CC attached to a 1-40 nucleotide sequence (II) in the transcription product. CC Amplification is done in the presence of an excess, preferably 50-500 nM, CC of a nucleic acid probe (III) and labeled by a reporter molecule and a CC quencher molecule. (I) encodes the motif 5'-GAAA-3' (A), and (II) CC contains the motif 5'-CUGANGA-3' (B). (III) has 25-60, especially 50, cm cleotides. The method is used to detect and quantify (I) from CC pathogenic bacteria. The method allows real-time detection and CC quantification of (I), particularly RNA by NASBA (RTM) (nucleic acid sequence-based amplification), without the difficulties associated with the of DNA probes (see Nucleic Acid Res., 26 (1998) 2150) and is suitable CC to routine use. Specifically the combination of (A) and (B) generates a CC hammerhead ribozyme that cleaves the probe and generates a fluorescent signal. Since many probes are cleaved, a high signal is produced, CC resulting in high sensitivity and shorter reaction times. The method is very specific since exact hybridization of probe to target is necessary CC cleavage to occur. Complicated probes are trequired because CC cleavage results in dissociation of the probe from the target (which CC allows multiplexing). Stable and inexpensive probes can be used, consisting mainly of 2'-deoxyribonucleotides.
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                                                                  Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                    29-MAY-2001; 2001US-294140P.
06-JUN-2001; 2001US-296249P.
10-SEP-2001; 2001US-318471P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human HER2 synthetic DNAzyme
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 29 BP; 5 A; 4 C; 4 G; 2 T; 14 other;
                                Claim 3; Page 153; 185pp; English.
                                                                                                                                             WPI; 2003-140484/13.
                                                                                                                                                                                                                                                                                                                              29-MAY-2002; 2002WO-US16840
                                                                                                                                                                                                                                                                                                                                                                    05-DEC-2002.
                                                                                                                                                                                                                                                                                                                                                                                                     WO200297114-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ABZ66526 standard; RNA;
                                                                                                                                                                                                                   (RIBO-) RIBOZYME PHARM INC
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15; Conserv
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Pred. No. 93
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The invention relates to a novel short interfering RNA (siRNA) nucleic

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RESULT 18
ABZ66528
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Best Local S
Matches 14
acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HBR2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HBR2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer and HIV infection, and AIDS. The sequences shown in ABSG6217 - ABZ66532 - ABZ65519, ABZ65529, ABZ65529, ABZ66529, ABZ66586 - ABZ66558 represent human ribozymes of the
                                                                                                                                                                                                                                                                                                                                                            Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encod HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                               Claim 3; Page 153; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 2003-140484/13
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        29-MAY-2001; 2001US-294140P.
06-JUN-2001; 2001US-296249P.
10-SEP-2001; 2001US-318471P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  enzymatic nucleic acid; H-Ras; N-Ras; HIV;
anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human HER2 synthetic DNAzyme
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ABZ66528 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ66217 - ABZ64543, ABZ65532 - ABZ65519, ABZ66555 - ABZ66529, ABZ66558 - ABZ66558 represent human ribozymes of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 29-MAY-2002; 2002WO-US16840
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    05-DEC-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (RIBO-) RIBOZYME
                                                                                                                                                                                                                                                                    invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Similarity
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                                                                                                                                                                                                                                                              relates to a novel short interfering RNA (siRNA) nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              PHARM INC
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 14.8;
Pred. No. 93;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   2 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                          encoding
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Matches Best Query Match

14;

Conservative

2;

Pred. No. 93; 2; Mismatches Score 14.8; Pred. No. 9

0

0

Gaps

0

BB

25;

Length Indels

29;

RGGCTAGCHACAACGA 16 AGGCTAGCTACAACGA

22

Local

Similarity

92.5%;

Sequence

29

B₽;

7 A; 4 C; 11 G; 2 T; 5 U; 0 other;

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RESULT 19
ABZ66529
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Best Local Similarity
Matches 14; Conserv
                                                                                                                                                                                                                                                                                                                                                        29-MAY-2001;
06-JUN-2001;
10-SEP-2001;
                                             The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ra human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ65453, ABZ65532 - ABZ65519,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                Claim 3; Page
                                                                                                                                                                                                                       Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                          05-DEC-2002.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence
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                                     ces shown in ABZ6221
ABZ66529, ABZ66586
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         synthetic
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                                                                                                                                                                                                                                                                                                                                                                       2001US-294140P
2001US-296249P
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                                                                                                                                                                                              English.
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Pred. No. 93;
                                      ABZ66658
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                                      represent
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RESULT 21
ABZ6650
ID ABZ66
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AC ABZ66
XX
AC ABZ66
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AC Humar
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ABZ66649
ID ABZ666XX
XX ABZ66
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Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ662217 - ABZ66533 - ABZ66539 - ABZ66529, ABZ66586 - ABZ66586 represent human ribozymes of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
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06-JUN-2001; 2001US-296249P.
10-SEP-2001; 2001US-318471P.
                    Human HIV enzymatic nucleic acid
                                                               21-MAR-2003
                                                                                                          ABZ66650
                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 29
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human HIV enzymatic nucleic acid
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                                                                                                                                                ABZ66650 standard; RNA; 29
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      invention relates to a novel short interfering RNA (siRNA) nucleic
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AGGCTAGCTACAACGA 22
                                                                                                                                                                                                                                                                                                                                                                                                                                       BP; 7
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87.5%;
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Pred. No. 93;
                                                                                                                                                                                                                                                                                                                                                 Mismatches
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RESULT 22
ABZ66651
ID ABZ66
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XX ABZ66
XX ABZ66
XX Human
XX Human
XX Human
XX Enzym
XW Enzym
XW anti-
XX ADZ60
PN WO200
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PN WO200
PP 05-DE
XX 29-Ma
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Best Local :
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06-JUN-2001;
10-SEP-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ64543, ABZ65532 - ABZ65519, ABZ66529, ABZ66529, ABZ66586 - ABZ66588 represent human ribozymes of the
                                                                                                                                                                               Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                             05-DEC-2002
                                                                                                                                    Homo sapiens.
                                                                                                                                                                                                                                                                       Human HIV enzymatic nucleic acid #3.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention relates to a novel short interfering RNA (siRNA) nucleic
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; 2001US-296249P.
; 2001US-318471P.
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                                                                                                                                                                                                                                                                                                                       (first entry)
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Pred. No. 9:
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29-MAY-2002; 2002WO-US16840.

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RESULT 23
ABZ66652
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Best Local :
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06-JUN-2001;
10-SEP-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-R human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and acid molecule of the invention has cytostatic, anti-HIV, and acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ66217 - ABZ64543, ABZ65532 - ABZ66529, ABZ66529, ABZ66586 - ABZ66658 represent human ribozymes of ABZ66525 - ABZ66529, ABZ66586 - ABZ66658 represent human ribozymes of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 122; Page 159; 185pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 29
                                                                                                                                                                                                                                                                                                       Human HIV enzymatic nucleic acid #4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       invention.
                                                                                                                                                                                                                                                     anti-rheumatic;
                                                                                                                                                                                                                                                                Human, ribozyme; short interfering RNA; siRNA; HER2; K enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic;
                                                                                                                                                                                                                                                                                                                                   21-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                       ABZ66652 standard; RNA;
                                                                                                                                                                         05-DEC-2002
                                                                                                                                                                                                                            Homo
                                                                                                                                               29-MAY-2002; 2002WO-US16840
                                                                                                                                                                                                 WO200297114-A2
                                       Mcswiggen
                                                                                           06-JUN-2001;
10-SEP-2001;
                                                                                                                    29-MAY-2001;
                                                                 (RIBO-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     invention relates to a novel short interfering RNA (siRNA) nucleic
                                                                                                                                                                                                                          sapiens
               2003-140484/13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            14;
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                                                                 RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                        AGGCTAGCTACAACGA 22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ; 2001US-294140P.
; 2001US-296249P.
; 2001US-318471P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 6 A;
                                                                                           ; 2001US-294140P.
; 2001US-296249P.
; 2001US-318471P.
                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                                                                      cancer; AIDS; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        92.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 9 C; 6
                                                                                                                                                                                                                                                                                                                                                                                          29
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 G; 2 T;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Score 14.8;
Pred. No. 93;
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                                                                                                                                                                                                                                                                    K-Ras;
ic; anti-HIV;
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RESULT 24
ABZ66653
ID ABZ66
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K.Ras, H-Ras, N-F human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and acid molecule of the invention has cytostatic, anti-HIV, and acid molecules activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ66217 - ABZ66533 - ABZ665319, ABZ66525 - ABZ66529, ABZ66586 - ABZ66588 represent human ribozymes of acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ66217 - ABZ66588 represent human ribozymes of ABZ66525 - ABZ66529, ABZ66586 - ABZ66588 represent human ribozymes of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   treating can
HER2, K-Ras,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence
                                                                                                                                                                                                                                                                       29-MAY-2001;
06-JUN-2001;
10-SEP-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human HIV enzymatic nucleic acid #5.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    21-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ABZ66653;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ABZ66653 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens.
                                                                                                                   Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                                                  29-MAY-2002; 2002WO-US16840.
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                                                                                                                                                                                                              Mcswiggen
                                                                                                                                                                                                                                           (RIBO-) RIBOZYME PHARM INC
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14; Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                         ; 2001US-294140P.
; 2001US-296249P.
; 2001US-318471P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          relates to a novel short interfering RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    92.5%;
87.5%;
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Pred. No. 93
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         93;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          29;
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acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-I human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and

The invention relates to a novel short

interfering

RNA (siRNA) nucleic e, that modulates

N-Ras,

Claim 122;

Page 159; 185pp; English.

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Matches
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                                       The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein mRN which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' of the catalytic domain. Lack of expression of the hairless gene due
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Catalytic DNA; catalytic RNA; hairless protein; ss; hair loss; atrichia; hair growth; hirsutism: catalv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 29
                                                                                                                                                                  Protein mRNA, useful for inhibiting cell, or for inhibiting transition
                                                                                                                                                                     New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ABX13988 standard; DNA; 29
              inherited mutations leads to the complete loss of hair, known atrichia. Abundant hair growth, hirsutism, can be improved by
                                                                                                                            Claim 3; Page 34; 65pp; English
                                                                                                                                                        to catagen phase
                                                                                                                                                                                                                             WPI; 2003-093020/08.
                                                                                                                                                                                                                                                         Christiano
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Homo sapiens.
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genes
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                       Location/Qualifiers 8...22
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                                                                                                                                                                                                                                                                                                                                                                                                                              "Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         hairless protein mRNA after nucleotide
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Pred. No. 9
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one way to
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 targeted,
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  transient
              inhibiting
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RESULT 26
ABX13989
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the
                                           New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase to catagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence
                                                                                                                             WPI; 2003-093020/08
                                                                                                                                                                                                                           13-APR-2001; 2001US-283618P.
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                                                                                                                                                                                                                                                                                                                                                                                          misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                           Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                              HOMO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         hair loss;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Catalytic DNA; catalytic RNA; hairless protein; ss;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide 1597.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        25-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ABX13989 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  human hairless protein mRNA immediately after nucleotide 1594.
                                                                                                                                                                                             (UYCO ) UNIV COLUMBIA NEW YORK.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          depilatory.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                          sapiens.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         atrichia; hair growth; hirsutism; catalytic nucleic acid;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 7 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first entry)
                                                                                                                                                                                                                                                                                                                                                                                          Location/Qualifiers 8..22
                                                                                                                                                                                                                                                                                                                                                            /note= "Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                         /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 92.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    10 C; 8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        22
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 14.8;
Pred. No. 93
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    G; 4 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
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Claim 3; Page 34; 65pp; English

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inherited mutations leads to the complete loss of hair, known as a trichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient concluding ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding a complete that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a coatalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen thair removal products which function by inhibiting hairless protein hair removal products which function by inhibiting hair cleaves the temps hairless protein the spread is the deoxy-ribozyme that cleaves the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Matches
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WPI; 2003-093020/08
                                                             Christiano AM
                                                                                                                                                                                     13-APR-2001; 2001US-283618P
                                                                                                                                                                                                                                               12-APR-2002;
                                                                                                                                                                                                                                                                                                                24-OCT-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  misc_feature
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhad ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Catalytic DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide 1641
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        25-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ABX13990 standard; DNA; 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            consensus sequence and binding domains contiguous with the 5' and 3' encof the catalytic domain. Lack of expression of the hairless gene due to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             specifically cleaves, or inhibits expression of, Hairles which comprises a catalytic domain that cleaves mRNA at
                                                                                                                       (UYCO ) UNIV COLUMBIA NEW YORK
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The invention discloses a new catalytic DNA or RNA molecule that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               hairless protein mRNA immediately after nucleotide 1597.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 RGGCTAGCHACAACGA 16
:||||||:|||||||
AGGCTAGCTACAACGA 22
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 7 A; 9 C; 10 G; 3 T; 0 other;
                                                                                                                                                                                                                                                  2002WO-US11683
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             catalytic RNA; hairless protein; ss;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Location/Qualifiers
8..22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  /*tag=
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                                                                                                                                                                                                                                                                                                                                                                                                                                     "Catalytic domain"
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Pred. No. 9:
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       29;
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12-APR-2002; 2002WO-US11683

24-OCT-2002.

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RESULT 28
ABX13991
ID ABX13
В
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                                                                                                                                                                    ribozyme; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase, hair follicle;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1641.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New catalytic nucleic acid molecule that specifically cleaves Hairless protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                         misc_feature
                                                                                                                            Synthetic
                                                                                                                                                                                                         Catalytic DNA; catalytic RNA; hairless protein; ss;
hair loss; atrichia; hair growth; hirsutism; cataly
                                                                                                                                                                                                                                           Deoxy-ribozyme,
                                                                                                                                                                                                                                                                                                                ABX13991 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 29 BP; 7 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Claim
                                                                                                                                      Homo sapiens.
                                                                                                                                                                                                                                                                   25-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           to catagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                    14;
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                                                                                                                                                                                                                                                                                                                                                                                              1 RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                                                                                                                                                                                                                         AGGCTAGCTACAACGA
                                                                                                                                                                                                                                                                  (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                            Location/Qualifiers
8..22
/*tag= a
                                                                                                                                                                                                                                           cleaving hairless protein mRNA after nucleotide 1698.
                                                                   /note= "Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    65pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                             92.5%;
87.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                 G; 4 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 14.8;
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                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                 93;
                                                                                                                                                                                                                                                                                                                                                                                                                                           DB 25;
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                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
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                                                                                                                                                                                                deoxy-ribozyme;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               CC of the catalytic domain. Lack of expression of the hairless gene due to constraint the catalytic domain. Lack of expression of the hairless gene due to controlled mutations leads to the complete loss of hair, known as catalytician. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology, concluding ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding cability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a ccatalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids cre useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen chair removal products which function by inhibiting hairless protein compositions for the catagen composition by inhibiting hairless protein mRNA immediately after nucleotide 1698.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
Best Local S
Matches 14
Key
misc_feature
                                                                                                                                      nair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase.
                                                               Homo sapiens.
Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Protein mRNA, useful for inhibiting cell, or for inhibiting transition
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                                                                                                          Deoxy-ribozyme,
                                                                                                                                                                                                                                                                                                 25-FEB-2003
                                                                                                                                                                                                                                                                                                                                       ABX13992
                                                                                                                                                                                                                                                                                                                                                                           ABX13992 standard; DNA; 29 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 3; Page 34; 65pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     catagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          invention discloses a new catalytic DNA or RNA molecule that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        7
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AGGCTAGCTACAACGA 22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                sequence and binding domains contiguous with the 5'
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           BP; 7
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                 (first entry)
                                                                                                                                                                                                                                                          cleaving hairless protein mRNA after nucleotide 1732
           Location/Qualifiers 8..22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             A; 7 C; 10 G; 5 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 92.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 14.8; DB Pred. No. 93;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     25;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0;
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RESULT 30
ABX13993
ID ABX13
XX CATA1
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CC which comprises a catalytic domain that cleaves mRNA at a defined
CC consensus sequence and binding domains contiguous with the 5' and 3' ends
CC of the catalytic domain. Lack of expression of the hairless gene due to
CC inherited mutations leads to the complete loss of hair, known as
CC atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting
CC gene suppression is through the use of catalytic nucleic acid technology,
CC including ribozymes and DNAzymes. Ribozymes are RNA structures which have
CC including ribozymes and DNAzymes. Ribozymes are RNA structures which have
CC asalf-catalytic enzymatic function and sequence specific RNA binding
CC ability. Small DNA oligonucleotides that have a similar structure to the
CC hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a
CC catalytic core and two sequence specific arms. The deoxy-ribozymes have
CC degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids
CC are useful in pharmaceutical compositions for inhibiting hair production
CC by a hair-producing cell, for inhibiting hair growth and for inhibiting
CC bhase. A non-human transgenic mammal is useful as a model for testing
CC human hairless protein mRNA immediately after nucleotide that Cleaves the
CC catalytic core and two immediately after nucleotide that Cleaves the
CC phase. A non-human transgenic mammal is useful as a model for testing
CC human hairless protein mRNA immediately after nucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                           Matches
                                                                                                                                                                                                                                                                                                                                                                                                                              Query Match
Best Local
hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozy catalytic core; cleavage site; pharmaceutical; hair production;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                Catalytic DNA; catalytic RNA; hairless protein; ss;
                                                                                                   Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide
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                                                                                                                                                                                                                                                                                                        a self-catalytic enzymatic function and sequence specific RNA binding ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAsymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1750.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless gene due to inherited mutations leads to the complete loss of hair, known as atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have
              ABX13994;
                                               ABX13994 standard; DNA; 29
                                                                                                                                                                                                                                                                             Sequence 29
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Score 14.8; I Pred. No. 93; 2; Mismatches

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CC which comprises a catalytic domain that cleaves mRNA at a defined CC which comprises a catalytic domain that cleaves mRNA at a defined CC consensus sequence and binding domains contiguous with the 5' and 3' ends CC of the catalytic domain. Lack of expression of the hairless gene due to CC inherited mutations leads to the complete loss of hair, known as CC atrichia. Abundant hair growth, and one way to get targeted, transient CC gene suppression is through the use of catalytic nucleic acid technology, CC including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding CC ability. Small DNA oligonucleotides that have a similar structure to the Chammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a CC catalytic core and two sequence specific arms. The deoxy-ribozymes have more lesient consensus cleavage site requirements and are less likely to CC degrade, in vivo, that hammerhead ribozymes. The catalytic mucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the catagen compassion. The sequence which function by inhibiting hairless protein mCC hair removal products which function by inhibiting hairless protein mCC haman hairless protein mRNA immediately after nucleotide 1801.
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Sequence
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specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless gene due to inherited mutations leads to the complete loss of hair, known as atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a catalytic made the constant of the catalytic enzymatic functions and sequence specific RNA binding ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a
                                                     catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the
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hair follicle:
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consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless gene due to inherited mutations leads to the complete loss of hair, known as atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding ability. Small DNA oligonucleotides that have a smillar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production
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                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein which comprises a catalytic domain that cleaves mRNA at a define
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The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at defined consensus sequence and binding domains contiguous with the 5 and 3 end of the catalytic domain. Lack of expression of the hairless gene due to inherited mutations leads to the complete loss of hair, known as atrichia. Abundant hair growth, hirsuitism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide 2033.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the
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"Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     29
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               2
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Pred. No. 93;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
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                                                                                                                                                        / a hair-producing
from anagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          deoxy-ribozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           that cleaves the
                                                                                                                                                                                      hair-producing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Gaps
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The invention discloses a new catalytic DNA

ဝူ

RNA

molecule

Claim 3;

Page

35;

65pp;

English.

catagen phase

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RESULT 36
ABX13999
ID ABX13
XX ABX13
XX ABX13
XX DEOXY
XX CAtal
KW CAtal
KW riboz
KW riboz
KW riboz
Synth
XX depil
XX Homo
OS Synth
XX Homo
OS Synth
XX Homo
OS Synth
XX Homo
OS Synth
XX 10200
PT misc.
PT misc.
PT 12-AF
XX 11-AF
XX (UYCC
XX X
PI Chrif
XX WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              CC consensus sequence and binding domains contiguous with the 5 and 3 ends CC inherited mutations leads to the complete loss of hair, known as CC inherited mutations leads to the complete loss of hair, known as CC atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting CC the genes promoting hair growth, and one way to get targeted, transient CC gene suppression is through the use of catalytic nucleic acid technology, CC including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding CC ability. Small DNA oligonucleotides that have a similar structure to the CC hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a CC catalytic core and two sequence specific arms. The deoxy-ribozymes have CC degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids CC are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen CC thair removal products which function by inhibiting hairless protein CC human hairless protein mRNA immediately after nucleotide 2047.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Catalytic DNA; catalytic RNA; hairless protein; 88; hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; bNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                          12-APR-2002; 2002WO-US11683.
                                                                                                                                                                                                                                                                                                                                                              misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                  Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Deoxy-ribozyme,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABX13999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined
                    WPI; 2003-093020/08
                                                              Christiano
                                                                                                                                               13-APR-2001; 2001US-283618P
                                                                                                                                                                                                                                                                               WO200283891-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               25-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ABX13999 standard; DNA; 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               14;
                                                                                                         UNIV COLUMBIA NEW YORK
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                RGGCTAGCHACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            GGGCTAGCTACAACGA 22
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   B₽;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   cleaving hairless protein mRNA after nucleotide 2083
                                                                                                                                                                                                                                                                                                                                                                Location/Qualifiers 8..22
                                                                                                                                                                                                                                                                                                                   /*tag= a
/note= "Catalytic domain"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 92.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   7 G; 3 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 14.8;
Pred. No. 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      93;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        25;
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New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                              to catagen phase
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Page 35; 65pp; English.

CC specifically cleaves, or inhibits expression of, Hairless Protein mRNA CC which comprises a catalytic domain that cleaves mRNA at a defined CC consensus sequence and binding domains contiguous with the 5' and 3' ends CC of the catalytic domain. Lack of expression of the hairless gene due to CC inherited mutations leads to the complete loss of hair, known as CC atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting CC the genes promoting hair growth, and one way to get targeted, transient CC gene suppression is through the use of catalytic nucleic acid technology, CC including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding CC ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a CC catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids care useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting that removal products which function by inhibiting hairless protein CC hair removal products which function by inhibiting hairless protein CC hair removal products which function by inhibiting hairless protein CC human hairless protein mRNA immediately after nucleotide 2083. The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves make the comprise at the BP; 9 A; 7 C; 9 G; 4 T; 0 other;

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밁
            8
                            Matches
                                  Query Match
Best Local Similarity
                                                       Sequence 29
              Н
                            14;
7
GGGCTAGCTACAACGA 22
             RGGCTAGCHACAACGA 16
                            Conservative
                                  92.5%;
                            2
                                   Score 14.8;
Pred. No. 9
                            Mismatches
                                    93
                                          В
                                          25;
                            0
                            Indels
                                        Length
                            0
                            Gaps
                            0
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RESULT 37
ABX14001
ID ABX14
XX ABX14
XX ABX14
XX Deoxy
XX Catal
DE Oxy
XX Catal
XW hair
XW hair
XW depil
XX Homo
OS Homo
OS Synth
XX Hom
OS Synth
XX Wilso
XX WO200
PD 24-00
PP 12-AH
                                                                                                                                                                                                                                     25-FEB-2003
                                                                                                                                                                                             Catalytic DNA; catalytic RNA; hairless protein; ss;
                                                                                                                                                                                                                Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide
                                                                                                                                                                                                                                                                            ABX14001 standard; DNA; 29
                                                                                                                                                                                                                                     (first entry)
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2380.

catalytic core; cleava hair follicle; anagen hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; Synthetic Homo sapiens phase; catagen phase; hair removal product;

misc_feature

Location/Qualifiers

24-OCT-2002. WO200283891-A2 8..22 note= "Catalytic domain"

12-APR-2002; 2002WO-US11683

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ABXI4002
ID ABXI4
XX ABXI4
XX ABXI4
XX Deoxy
XX Catal
DE Deoxy
XX Catal
XW riboz
XW riboz
XW riboz
XW riboz
XW riboz
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
Best Local
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                                            misc_feature
                                                                                                                                                                             Synthetic
                                                                                                                                                                                                                                                                                                                                                                             hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Catalytic DNA; catalytic RNA; hairless protein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Deoxy-ribozyme,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                25-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABX14002 standard; DNA; 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          specifically creaves, or illustrate constraints mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises a catalytic domain that cleaves mRNA at a defined which comprises the comprise of the co
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       13-APR-2001; 2001US-283618P
                                                                                                                                                                                                                     Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (UYCO ) UNIV COLUMBIA NEW YORK
                                                                                                                                                                                                                                                                                                                                              follicle;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 BP; 6 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       discloses
                                                                                                                                                                                                                                                                                                                                                  anagen
Location/Qualifiers
8..22
/*tag= a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   cleaving hairless protein mRNA after nucleotide 2395
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87.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 10 C; 8 G; 5 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                  phase;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ВÞ
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Pred. No. 93
                                                                                                                                                                                                                                                                                                                                                  catagen phase; hair removal
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            DB 25;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Length 29;
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CC specifically cleaves, or inhibits expression of, Hairless Protein mRNA CC which comprises a catalytic domain that cleaves mRNA at a defined CC consensus sequence and binding domains contiguous with the 5' and 3' ends CC inherited mutations leads to the complete loss of hair less gene due to cf the catalytic domain. Lack of expression of the hairless gene due to cf the genes promoting hair growth, hirsutism, can be improved by inhibiting CC the genes promoting hair growth, and one way to get targeted, translent CC gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding CC ability. Small DNA oligonuclectides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a CC catalytic core and two sequence specific arms. The deoxy-ribozymes have are useful in pharmaceutical compositions for inhibiting hair production by a hair-producting cell, for inhibiting hair growth and for inhibiting the catalytic micleic acids are useful and paradection of a hair follicle from the anagen phase to the catagen CC phase. A non-human transgenic mammal is useful as a model for testing thair removal products which function by inhibiting hairless protein mCC than hairless protein mRNA immediately after nucleotide 2395.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New catalytic nucleic acid molecule that specifically cleaves Hairless protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase {\sf cell}, or for inhibiting transition of a hair follicle from anagen phase
Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 3; Page 35; 65pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The invention discloses a new catalytic DNA or RNA molecule that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         to catagen phase
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A;
9 C; 8 G; 3 T; 0 other;
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Matches Query Match госат 7 1 RGGCTAGCHACAACGA 16 14; Similarity GGGCTAGCTACAACGA Conservative 92.5**%**; 87.5**%**; 22 *ا*د Score 14.8; Pred. No. 9: Mismatches 93; DB 25; <u>,</u> Length Indels <u>,,</u>

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AC O AAA14525 standard; DNA; 30

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08-AUG-2000 (first entry)

Oligonucleotide 5'-polyNM-gaglink-(Pleio)-DNase-1023-B/P

antisense sequence; aptamer; gene expression; ss. Reverse transcriptase; RNase H; stem-loop structure; inverted tandem repeat; vector; inhibitory nucleic ac acid: genetic element;

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       CC (BSCDNA) in eukaryotic cells. They use a DNA cassette that produces CC sscDNA in vivo. The cassette contains the Moloney murine leukemia virus creverse transcriptase/RNase H, a bacterial restriction endonuclease CC reverse transcriptase synthesises cDNA of a specified sequence. CC which the reverse transcriptase synthesises cDNA of a specified sequence. CC The ssDNA is then modified to remove all flanking vector sequences by CC taking advantage of the stem-loop structure of the cDNA, which forms as CC a result of the inclusion of a inverted tandem repeat that allows the ScDNA to fold back on itself, forming a double stranded DNA stem, in CC the sequence of interest. The double-stranded stem contains one or more for delivery to a cell. The vectors are is useful for producing a ssDNA concleic acid molecule which is an antisense sequence or aptamer, an mRNA contains and target cell are useful for antisense sequence or aptamer, an mRNA contains and the course of the cell are useful for alleviating pathological conditions by regulating gene expression. The present oligonucleotide was used to condition a vector for use in the course of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                         Matches
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                                                            Ribozyme, hammerhead, RNAase degradation; catalytic; PKCalpha; VEGF; protein kinase C alpha; tumour necrosis factor alpha; TNFalpha; cancer; vascular epithelial growth factor; gene expression; malignant glioma; cell proliferation; cytostatic; human; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               16-SEP-1999;
04-OCT-1999;
                                                                                                                                                 Human short protein kinase C (PKC)alpha DNA ribozyme.
                                                                                                                                                                                  09-MAY-2000
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                              Homo sapiens
                                                                                                                                                                                                                    AAZ87648
                                                                                                                                                                                                                                                  AAZ87648 standard; DNA; 30 BP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; Page 45; 77pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2000-317974/27
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2; Mismatches 0;
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WO9963066-A2

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                                                                                                                                                                                      ribozymes, tumour necrosis factor (TNF)alpha ribozyme, rat and human vascular epithelial growth factor (VEGF) ribozymes. These ribozymes can be used for treating or preventing a disease or condition responsive to an alteration in the expression of a gene, where the ribozyme is capable of cleaving the RNA transcribed from the gene. They can be used for treating or preventing a disease or condition associated with the proliferation of rapidly dividing cells, e.g. cancer such as malignant glioma. They can also be used for inhibiting the proliferation of cells. The use of 2'-amino modified pyrimidine can provide ribozymes of improved stability which retain the activity of the unmodified ribozyme. The
                                                                                                                                                                                                                                                                                                                                                                   The invention provides novel modified ribozymes that have 3 or more pyrimidine nucleotides (PMN) in the ribozyme modified at the 2' position, where the PMNs are modified to 2' amino PMNs and the ribozymes exhibit improved stability to RNAase degradation and exhibits 85% or more catalytic activity of the unmodified ribozymes. The ribozymes of the invention are selected from rat and human protein kinase C (PKC) alpha
                                                                                                                                        Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Disclosure; Page 9; 93pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                01-JUN-1998;
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                                                                                                                                                                         present sequence represents a human short PKCalpha DNA ribozyme
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (NORA-) NORWEGIAN RADIUM HOSPITAL RES FOUND. (DZIE/) DZIEGLEWSKA H E.
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SUMMARIES

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Patent: DE 19915141-A 4 28-SEP-2000;
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Patent: WO 0159103-A 9268 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
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                       Fattaey, A.R., Jarvis, T., Mo
Method and reagent for the
                                            artificial sequences.
        Patent: WO 0157206-A 2991 09-AUG-2001;
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/mol type="genomic DNA"
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/note="Kuenstliche DNA-Sequenz"
/note="Kuenstliche DNA-Sequenz"
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9268 from Patent WO0159103.
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                                                           Usman, N., Mcswiggen, J.A., Zinnen, S., Chowrira, B. and Blatt, L. Nucleic acid sensor molecules Patent: WO 0166721-A 21 13-SEP-2001; RIBOZYME PHARMACEUTICALS, INC. (US)
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Sequence 21 from Patent
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Patent: WO 0188124-A 5346 22-NOV-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); GLAXO GROUP LIMITED (GB)
Location/Qualifiers
                                                                                              RIBOZYME PHARMACEUTICALS, INC. Thompson, James (US)
                                                                                                                  Method and reagent for the inhibition channel-1 (clca-1)
Patent: WO 0211674-A 5447 14-FEB-2002
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1 (bases 1 to 29)
1 Todd, A. V., Fuery, C. J. and Cairns, M. J.
1 Catalytic nucleic acid-based diagnostic methods
1 Patent: US 6361941-A 25 26-MAR-2002;
1 Location/Qualifiers
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 23 26-MAR-2002;
Location/Qualifiers
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synthetic c
artificial
Altering gene expression with ssdna produced in vivo Patent: WO 0125419-A 3 12-APR-2001; Cytogenix, Inc. (US)
                                                                                                                                                                                                                                                                                                                                                                                                                                                  Amino-modified ribozymes
Patent: WO 9963066-A 7 09-DEC-1999;
DZIEGLEWSKA HANNA EVA (GB); SIOUD M
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Sequence 7 from Patent WO9963066.
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 55 26-MAR-2002;
Location/Qualifiers
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                                      Conrad, C.A. and Chen, Y.
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/mol type="genomic DNA"
/db_xref="taxon:32630"
/note="PKC alpha ribozyme"
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                                      Jarvis, T., von Carlowitz, I., Mcswiggen, J.A.,
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/db_xref="taxon:32630"
/note="Synthetic oligonucleotide"
/note 8 c 8 g 9 t
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/mol_type="genomic DNA"
/db xref="taxon:132630"
/note="Enzymatic Nucleic Acid"
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/mol_type="genomic DNA"
/db_xref="taxon:32630"
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/mol_type="genomic DNA"
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AX274722
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/mol_type="genomic DNA"
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/mol_type="genomic DNA"
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Zymogenic nucleic acid detection methods
Patent: US 6140055-A 5 31-OCT-2000;
Location/Qualifiers
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 42 26-MAR-2002;
Location/Qualifiers
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         1 (bases 1 to 31)
Todd,A.V., Fuery,C.J. and Cairns,M.J.
Catalytic nucleic acid-based diagnostic methods
Patent: US 6361941-A 45_26-MAR-2002;
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Todd, A. V., Euery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 51 26-MAR-2002;
                                                                                                                                                                                                                Unknown
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 48 26-MAR-2002;
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2; Mismatches 0;
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Todd,A.V., Fuery,C.J. and Cairns,M.J.
Zymogenic nucleic acid detection methods,
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/mol_type="genomic DNA"
/db_xref="taxon:32630"
/note="Nucleic Acid"
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Method and reagent for the modulation and diagnosis of
nogo gene expression
Patent: WO 0159103-A 5989 16-AUG-2001;
RIBDZYME PHARMACEUTICALS, INC. (US); Blatt, Lawrence ()
RIBDZYME PHARMACEUTICALS, INC. (US); Bharat M. (US)
McSwiggen, James (US); Chowriza, Bharat M. (US)
Location/Qualifiers
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patent: WO 0159103-A 5990 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
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Blatt,L., Mcswiggen,J. and Method and reagent for the
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/mol type="genomic DNA"
/db xref="taxon:32630"
/note="Nucleic Acid"
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/db_xref="taxon:32630"
/note="Nucleic Acid"
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Patent: WO 0159103-A 5991 16-AUG-2001;
RIBOZYME PHARWACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
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Similarity 87.5%;
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Patent: WO 0159103-A 5993 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US) ;
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                                      Blatt,L., Mcswiggen,J. and Chowrira,B. Method and reagent for the modulation
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/mol type="genomic DNA"
/db xref="taxon:32630"
/note="Nucleic Acid"
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/mol_type="genomic DNA"
/db_xref="taxon:32630"
/note="Nucleic Acid"
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Pred. No. 3.1e+02;
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nogo gene expression
Patent: WO 0159103-A 5995 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Law
McSwiggen, James (US); Chowrira, Bharat M. (US)
Location/Qualifiers
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Patent: WO 0159103-A 5994 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Law
MCSwiggen, James (US); Chowrira, Bharat M. (US)
Location/Qualifiers
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                                                                Blatt,L., Mcswiggen,J. and Chowrira,B.M. Method and reagent for the modulation an
                                                                                                                   synthetic construct
synthetic construct
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/mol type="genomic DNA"
/mb_xref="taxon:32630"
/note="Nucleic Acid"
/note="Nucleic Acid"
/note="Nucleic Acid"
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|mol type="genomic DNA"
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|note="Nucleic Acid" 7 t
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Pred. No. 3.1e+02;
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                                       RIBOZYME PHARMACEUTICALS, INC. (US); McSwiggen, James (US); Chowrira, Bha:
Location/Qualifiers
                                                                              nogo gene expression
Patent: WO 0159103-A 5997 16-AUG-2001;
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AX220554
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/db_xref="taxon:32630"
/note="Nucleic Acid"
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/mol_type="genomic DNA"
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Blatt, L., Mcswiggen, J. and Chowrira, B.M. Method and reagent for the modulation and nogo gene expression Patent: WO 0159103-A 5996 16 AUG-2001;
                                                                                                                      Blatt,L., Mcswiggen,J. and Chowrira,B.M. Method and reagent for the modulation and
/organism="synthetic construct"
/mol_type="genomic DNA"
/db_xref="taxon:32630"
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Pred. No. 3.1e+02;
2; Mismatches 0
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Method and reagent for the modulation and dia
nogo gene expression
Patent: WO 0159103-A 5998 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M. (
McSwiggen, James (US); Chowrira, Bharat M. (
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Patent: WO 0159103-A 5999 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
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/mol_type="genomic DNA"
/db_xref="texxon:32630"
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Method and reagent for the modulation and diagnosis of cd20 and
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Method and reagent for the modulation and dia
nogo gene expression
Patent: WO 0159103-A 6001 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
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/db xref="taxon:32630"
/note="Nucleic Acid"
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Method and reagent for the modulation and diagnosis of cd20 and
nogo gene expression
Patent: WO 0159103-A 6002 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Lawrence (US);
McSwiggen, James (US); Chowrira, Bharat M. (US)
Location/Qualifiers
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Patent: WO 0159103-A 6003 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Law
McSwiggen, James (US); Chowrira, Bharat M. (US)
Location/Qualifiers
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Method and reagent for the modulation and diagnosis of cd20 and reagent for the modulation and diagnosis of cd20 and reagent expression

Patent: WO 0159103-A 6004 16-AUG-2001;

RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Lawrence (US);

McSwiggen, James (US); Chowrira, Bharat M. (US)

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score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

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Patent: WO 015103-A 9268 16-AUG-2001;
RIBOZYME PHARWACEUTICALS, INC. (US); Blatt,
MCSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
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             Jarvis,T.,
Ellis,J.H.
                                                                synthetic construct synthetic construct
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Chowrira,B. and Blatt,L.
Nucleic acid sensor molecules
Patent: WO 0166721-A 21 13-SEP-2001;
RIBOZYME PHARMACEUTICALS, INC. (US)
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                               Method and reagent for the inhibition of erg Patent: WO 0188124-A 5346 22-NOV-2001; RIBOZYME PHARMACEUTICALS, INC. (US); GLAXO
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Query Match
Best Local Similarity
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l Similarity 100.0%;
16; Conservative
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 23 26 MAR-2002;
Location/Qualifiers
                                                                                                                                                                                                         Sequence 23
AR201808
                                                                                                                                                                                                                                                                                                                  1 RGGCTAGCTACAACGA 16
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Patent: WO 0211674-A 5447 14-FEB-2002;
RIBOZYME PHARMACEUTICALS, INC. (US);
Thompson, James (US)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          synthetic construct
synthetic construct
artificial sequences.
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/mol type="genomic DNA"
/db xref="taxon:32630"
/note="Enzymatic Nucleic Acid"
/ c 4 g 2 t
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1 (bases 1 to 29)
Todd, A. V., Fuery, C. J. and Cairns, M. J.
Todd, A. V., Fuery, C. J. and Cairns, M. J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 25 26 MAR-2002;
Patent: US 6361941-A 25 26 MAR-2002;
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AR201840
AR201840.1
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Sequence 7
AX009377
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A.55 26-MAR-2002;
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Patent: WO 9963066-A 7 09-DI
DZIEGLEWSKA HANNA EVA (GB);
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Conrad,C.A. and Chen,Y.
Altering gene expression with ssdna produced Patent: WO 0125419-A 3 12-APR-2001;
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synthetic construct
artificial sequences.
                          Jarvis, T., von Carlowitz, I., Mcswiggen, J.A., Hamblin, P.A.
and reagent for the inhibition
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/mol type="genomic DNA"
/db_xref="taxon:32630"
/note="PKC alpha ribozyme"
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/mb_xref="taxon:32630"
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Pred. No. 2.8e+02;
1; Mismatches 0;
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Pred. No. 2.8e+02
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(GB); SIOUD M
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RIBOZYME PHARMACEUTICALS, INC. (US) ; GLAXO GROUP LIMITED
Location/Qualifiers
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/mol_type="genomic DNA"
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db_xref="taxon:32630"
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Ellis,J.H.
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AX274722
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AR116975
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Zymogenic nucleic acid detection methods
Patent: US 6140055-A 5 31-OCT-2000;
Location/Qualifiers
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 42 26-MAR-2002;
Location/Qualifiers
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 45 26-MAR-2002;
Location/Qualifiers
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Todd,A.V., Fuery,C.J. and Cairns,M.J.
Todd,A.V., Fuery,C.J. and Cairns,M.J.
Catalytic nucleic acid-based diagnostic methods
Patent: US 6361941-A 48 26-MAR-2002;
Location/Qualifiers
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Sequence 5
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Catalytic nucleic acid-based diagnostic
Patent: US 6361941-A 51 26-MAR-2002;
Location/Qualifiers
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AR201836
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Todd, A.V., Fuery, C.J. and Cairns, M.J.
Zymogenic nucleic acid detection methods,
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Pred. No. 2.8e+02;
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Sequence 5990 from Patent
AX220548
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Patent: WO 0159103-A 5989 16-AUG-2001;
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/db_xref="texon:32630"
/noTe="Nucleic Acid"
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/db_xref="taxon:32630"
/note="Nucleic Acid"
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Method and reagent for the modulation and dia
nogo gene expression
Patent: WO 0159103-A 5990 16-AUG-2001;
RIBOZYME WHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M. (
Location/Qualifiers
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|mol type="genomic DNA"
|/db_xref="texon:32630"
|/note="Nucleic Acid"
| 8 c 6 g 8 t
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/mol type="genomic DNA"
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/note="Nucleic Acid"
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Patent: WO 0159103-A 5992 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US) ; Blatt,
McSwiggen, James (US) ; Chowrira, Bharat M. (
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Patent: WO 0159103-A 5993 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
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Patent: WO 0159103-A 5995 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
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Patent: WO 0159103-A 5994 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Lawrence (US)
MCSwiggen, James (US); Chowrira, Bharat M. (US)
Location/Qualifiers
 nogo gene expression Patent: WO 0159103-A 5996 RIBOZYME PHARMACEUTICALS,
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/db_xref="taxon:32630"
/note="Nucleic Acid"
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/mal_type="genomic DNA"
/db_type="taxon:32630"
/noTe="Nucleic Acid"
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Patent: WO 0159103-A 5998 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Lawrence (US)
McSwiggen, James (US); Chowrira, Bharat M. (US)
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Location/Qualifiers
                                                          Blatt,L., Mcswiggen,J. and Chowrira,B.M. Method and reagent for the modulation and
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Patent: WO 0159103-A 5997 16-AUG-2001;
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/mol type="genomic DNA"
/db_xref="taxon:32630"
/note="Nucleic Acid"
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Location/Qualifiers
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7 c 9 g
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/mol_type="genomic DNA"
/db_xref="taxon:32630"
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Pred. No. 2.8e+02;
1; Mismatches 0
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AX220558
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Patent: WO 0159103-A 5999 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
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Patent: WO 0159103-A 6000 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
                                                                                                                                                                                                 Sequence 6000 from Patent AX220558 AX220558.1 GI:15548282
                                                                                                              Blatt,L., Mcswiggen,J. and Chowrira,B.M. Method and reagent for the modulation and diagnosis
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/mol type="genomic DNA"
/db_xref="taxon:32630"
/note="Nucleic Acid"
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/db_xref="taxon:32630"
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6 c 8 g
/organism="synthetic construct"
/mol_type="genomic DNA"
/db_xref="taxon:32630"
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Patent: WO 0159103-A 6001 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M.
Location/Qualifiers
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Sequence 6002 from Patent
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                                                                                   Blatt,L., Mcswiggen,J. and Chowrira,B.M.
Method and reagent for the modulation and diagnosis
nogo gene expression
Patent: WO 0159103-A 6002 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt, Lawrenc
McSwiggen, James (US); Chowrira, Bharat M. (US)
Location/Qualifiers
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10 c 7 g
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/mol_type="genomic DNA"
/db_xref="taxon:32630"
/note="Nucleic Acid"
10 c 6 g 7 t
                                     /organism="synthetic construct"
/mol_type="genomic DNA"
/db_xref="taxon.32630"
              /note="Nucleic Acid"
12 c 5 g
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Pred. No. 2.8e+02;
1; Mismatches 0
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Pred. No. 2.8e+02;
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AX220561
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ACCESSION
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AX220562
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Patent: WO 0159103-A 6004 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M. (
Location/Qualifiers
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Sequence 6004 from Patent
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Patent: WO 0159103-A 6003 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US); Blatt,
McSwiggen, James (US); Chowrira, Bharat M. (
Location/Qualifiers
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Patent: WO 0159103-A 6005 16-AUG-2001;
RIBOZYME PHARMACEUTICALS, INC. (US) ; Blatt,
MCSwiggen, James (US) ; Chowrira, Bharat M.
Location/Qualifiers
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regulator; detergent; dental
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              Disclosure;
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This sequence is used in a method which involves the production of CC catalytic DNA molecules which can be used for cleaving target nucleic cc acid molecules. Such DNA molecules can be used in pharmaceutical and CC medical products (e.g. for wound debridement, clot dissolution), as well cas in household items (e.g. detergents, dental hygiene products, meat CC tenderisers'). Other suitable substrates include those comprising or CC produced by picornaviruses, hepadnaviridae, (e.g. HBV, HCV), produced by picornaviruses, hepadnaviridae, (e.g. HBV, HCV), CC lymphocryptoviruses (e.g. HPV), gammaherpesvirinae (e.g. EBV), CC lymphocryptoviruses, leukemia viruses (e.g. HTLV-1 and -11), Influenza viruses, CC viruses and retroviruses contributing to immunodeficiency diseases and covine leukemia viruses. They can also be used as regulators of gene expression.
                                                                      Identifying sites on a target or in vitro-synthesized RNA accessible antisense, ribozyme, or DNAzyme binding comprises incubating hybridizing the target RNA with an antisense oligodeoxynucleotides,
                                                                                                                                                                            WPI; 2000-665016/64.
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                                                 ribozymes or DNAzymes
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Page 7; 38pp; English
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The present invention relates to a method for identifying sites

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RESULT 3
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The
                                                                                                                                                                                                                                                     Sequence 16
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hybridizing the target RNA with an antisense
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      target RNA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       e present invention relates to a method for identifying sites on a rget RNA which are accessible to pairing by antisense DNA, ribozymes cazymes. The present sequence is a DNAzyme catalytic core sequence. The method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is a property of the method of the present invention the target sequence is a property of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated the method of the present invention the target sequence is incubated to the present invention the present invention the target sequence is incubated to the present invention the present invention the present invention the target sequence is incubated to the present invention the
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 enzymatic nucleic acid component and one or more gensor components. (Ī) is useful in diagnostic applications to identify the presence of genss and/or gene products indicative of a particular genotype and/or phenotype, e.g. a disease state or infection and for diagnosis of disease states or physiological abnormalities related to the expression of viral, bacterial or cellular RNA and DNA. (I) is useful in nucleic acid-based electronics, for the detection of specific target signalling molecules, in assays to assess the specificity, toxicity and effectiveness of various small molecules, nucleoside analogues or non-nucleic acid drugs or for detection of pathogens, biochemicals, organic or inorganic compounds. The present sequence is that of a DNAzyme motif of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New nucleic acid sensor molecule useful in diagnostic applications, nucleic acid-based electronics and functional genomics, comprises a enzymatic nucleic acid and one or more sensors
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                                                               Human; 88; antisense therapy; cytostatic; antiinflammatory; haemostatic; cerebroprotective; nootropic; neuroprotective; antiparkinsonian; muscular; CD20; neurite growth inhibitor gene; NOGO; hammerhead ribozyme; DNAzyme; inozyme; G-cleaver; amberzyme; zinzyme; Jymphoma; leukaemia; B-cell lymphoma; non-Hodgkin's lymphoma; NHL; lymphocytic leukaemia; human immunodeficiency virus; HIV associated NHL; mantle-cell lymphoma; MCL; immunocytoma; IMC; immune thrombocytopaenia; stroke; dementia; inflammatory arthropathy; central nervous system injury; cerebrovascular accident; CVA; Alzheimer's disease; multiple sclerosis; chemotherapy-induced neuropathy; amyotrophic lateral sclerosis; ALS; parkinson's disease; ataxia; Huntington's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The present invention provides nucleic acid molecules capable of downregulating the expression of the human checkpoint kinase-1 (Chk1) gene. These may be antisense or ribozyme sequences, and are useful in the treatment of diseases associated with conditions affected by Chk1 levels, including cancer. The present sequence is an oligonucleotide described in the exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Novel nucleic acid molecule e.g., ribozymes or antisense nucleic acid molecules, which downregulates expression of a checkpoint kinase-1 gene, useful for treating colorectal, lung, breast or prostate cancers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           03-FEB-2000; 2000US-0179983
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ABK61076 standard; DNA;

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CC expression of a CD20 gene and a nucleic acid molecule which down regulates CC expression of a CD20 gene and a nucleic acid molecule which down cregulates expression of a neurite growth inhibitor gene (NOGO).

CC possessing an CP motif), a G-cleaver (cleaving an RNA molecule cold cleaving an RNA molecule cold cleaving RNA with a NYN molecule cold cleaving RNA with a NYN molecule cold cleaving RNA with a CD20 in the presence of a divalent cation that is cleaving RNA with a CD20 in the presence of a divalent cation that is cleaver cleaving RNA with a cell to reduce cc cold activity of the cell and treat a patient having a condition cassociated with the level of CD20. The treatment may further comprise the cc cassociated with the level of CD20. The treatment may further comprise the cc cassociated with the level of CD20. The treatment may further comprise the cc cassociated with the level of CD20. The treatment may further comprise the cc cassociated with a sesociated NHL, lymphona, leukaemia, HIV (human clow-grade or follicular NHL, lymphocytic leukaemia, HIV (human clow-grade or follicular non-Hodgkin's lymphona (NHL), can immune comprise the cc immunocytoma (IMC), small B-cell lymphocytic lymphoma (NHL), immune comprise concepts a sesociated NHL, mantle-cell lymphoma (NHL), concepts a patient cation that is preferably My^2+. Furthermore, the nucleic acid may be contacted with a cell to reduce NOGO activity of the cell and creatment may further comprise the use of one or more therapies.

CC treatment may further comprise the use of one or more therapies.

CC treatment may further comprise the use of one or more therapies.

CC treatment may further comprise the use of one or more therapies.

CC treatment may further comprise the use of one or more therapies.

CC treatment may further comprise the use of one or more therapies.

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28-FEB-2000; 2000US-185516P.
06-MAR-2000; 2000US-187128P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Nucleic acid molecules, e.g., enzymatic nucleic acids and antisense constructs, which down regulate expression of a CD20 gene or neurite growth inhibitor gene useful for treating, e.g., lymphoma, leukemia,
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(MCSW/)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Disclosure; Fig 5; 200pp; English
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                                                                                                                                                           Sequence 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           and central nervous system injury
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (CHOW/)
                                                                                                  Local
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                                                                               16;
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                                                                                                    Similarity
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                                                                                 Conservative
                                                                                                                                                             BP; 5 A; 4 C; 4 G;
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                                                                                                                           97.5%;
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                                                                                    Score 15.6; D; Pred. No. 34; 0; Mismatches
                                                                                                                                                               2 T; 1 other;
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                                                                                                                              Length
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RESULT 8
ABK22719
ID ABK2
XX
AC ABK2
XX
DT 09-A
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                                                                                                                                                                                                                                                                                                   The invention relates to enzymatic nucleic acid molecules that down CC regulate expression of chloride channel calcium activated 1 (CLCA1) genes by cleaving RNA derived from the genes. The nucleic acid sequences are useful as pharmaceutical agents for treating conditions such as chronic constructive pulmonary disease (COPD), chronic bronchitis, asthma, cystic cfibrosis, obstructive bowel syndrome and any other diseases or conditions that are related to or will respond to the levels of CLCA1 in a cell or crissue. The sequences are useful for reducing CLCA1 activity in a cell, chence, are useful for treatment of a patient having a condition comparises the use of one or more therapies under conditions suitable for the creatment, for example, oxygen therapy, bronchodilators, corticosteroids, antibacterials, vaccinations, acetylcysteine and mucokinetic agents. The cucleic acids of the invention are also used as diagnostic tools to cexamine genetic drift and mutations within diseased cells or to detect the presence of CLCA1 RNA in a cell. This sequence represents an creative of the invention are also used as captance represents and concleic acid molecule of the invention.
                                                                                                                                                                                                           Best Loc
Matches
                                                                                                                                                                                                                                          Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human; chloride channel calcium activated 1; CLCA1; ss; antiasthmatic; antiinflammatory; chronic obstructive pulmonary disease; COPD; asthma; chronic bronchitis; cystic fibrosis; obstructive bowel syndrome; oxygen therapy; bronchodilator; corticosteroid; vaccination; mucokinetic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Enzymatic polynucleotide that down regulates expression of c channel calcium activated gene, useful for treating Chronic pulmonary disease (COPD), chronic bronchitis and asthma
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  chronic bronchitis; cystic fibre oxygen therapy; bronchodilator;
09-APR-2002
                                ABK22719;
                                                             ABK22719 standard; RNA; 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Disclosure; Fig 4; 152pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Thompson J, Grupe A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      09-AUG-2000; 2000US-224383P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2002-217145/27
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                                                                                                                                                                                                                            Local
                                                                                                                                                                                                           l Similarity
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SYNTEX USA LLC.
THOMPSON J.
                                                                                                                                                                           RGGCTAGCTACAACGA 16
                                                                                                                                         RGGCTAGCTACAACGA 16
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                                                                                                                                                                                                                                                                          BP;
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                                                                                                                                                                                                             Conservative
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(first entry)
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                                                                                                                                                                                                                                                                          4 C; 4 G;
                                                                                                                                                                                                                          97.5%; Score 15.6; DB 100.0%; Pred. No. 34;
                                                                                                                                                                                                                         100.0%;
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                                                              ВP
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                                                                                                                                                                                                             0,
                                                                                                                                                                                                                                                                          2 T; 1 other;
                                                                                                                                                                                                             Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      #5445
                                                                                                                                                                                                                                           24;
                                                                                                                                                                                                           <u>,</u>
                                                                                                                                                                                                                                          Length 16;
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ophthalmological; antiarthritic; antipsoriatic; virucide; osteopathic; vulnerary; cancer; lymphoma; Ewing's sarcoma; melanoma; psoriasis; tumour angiogenesis; diabetic retinopathy; macular degeneration; neovascular glaucoma; myopic degeneration; arthritis; verruca vulgaris; angiofibroma of tuberous sclerosis; port-wine stain; wound healing; sturge Weber syndrome; Kippel Trenaunay-Weber syndrome; leukaemia; ss;
                                                                                                                                                                       16-MAY-2000; 2000US-0572021.
                                                                                                                                                                                                                                                                                                           22-NOV-2001
                                                                                                                                                                                                                                                                                                                                                                             WO200188124-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              amberzyme.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Osler-Weber-rendu syndrome, leukaemia; osteoporosis; DNAzyme; inozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DNAzyme
                                                                                                     (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                         16-MAY-2001; 2001WO-US15866.
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                                                                         GLAXO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      motif
   Von Carlowitz I,
                                                                         GROUP LTD
McSwiggen JA, Mclaughlin F,
          Randi AM;
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Novel polynucleotide which down regulates expression of Ets-related gene, useful for treating cancer, diabetic retinopathy, macular degeneration, arthritis, psoriasis, verruca vulgaris and Sturge Webersyndrome

Disclosure; Figure 5; 149pp; English.

CC expression of an Ets-related gene (ERG). (I) is useful for treating conditions selected from cancer, lymphoma, Ewing's sarcoma, melanoma, tumour angiogenesis, diabetic retinopathy, macular degeneration, cc neovascular glaucoma, myopic degeneration, arthritis, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, port-wine stains, Sturge cweber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-rendu syndrome, leukaemia, osteoporosis and wound healing. (I) is useful for treating a patient having a condition associated with the level of ERG, by contacting cells of the patient with (I) under conditions suitable for the treatment. The method comprises the use of one or more therapies cunder conditions suitable for the treatment. Leukaemia or tumour canjuogenesis is treated by administering (I) to the patient in cc conjunction with one or more of other therapies such as radiation or chemotherapy treatment. (I) is useful for reducing ERG activity in a ccell, by contacting the cell with (I). (I) is useful for cleaving RNA of Ccell, by contacting the cell with RNA, in the presence of a divalent cation such as Mg2+. (I) is useful for diagnosis of conditions and diseases related to the expression of ERG, and as diagnostic tool to examine genetic drift and mutations within diseased cells or to detect the presence of ERG RNA in a cell. (I) is useful for specifically cargeting genes that share homology with ERG gene or ERG fusion genes. ABX17354-ABX2719 represent nucleic acids, including antisense and cargeting nucleic acid molecules which regulate expression of ERG, and cargeting antisense and the invention.

Sequence 16 BP; 5 A; 4 C; 4 G; 2 T; 1 other;

밁 S Query Match Best Local S Matches 16 16; Similarity RGGCTAGCTACAACGA 16 RGGCTAGCTACAACGA Conservative 97.5%; 100.0%; 16 0, Score 15.6; D Pred. No. 34; Mismatches 멂 ٥, Length Indels ,. Gaps

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RESULT 9
ACA10109
      cancer and is useful for down-regulating REL-A activity in a cell, for treating a patient having a condition associated with the level of REL-A. (I) is useful for cleaving RNA comprising a sequence of REL-A gene, in the presence of a divalent cation, especially Mg'2'+. The enzymatic and antisense nucleic acid molecules are useful for treating breast, lung, prostate, colorectal, brain, oesophageal, stomach, bladder, pancreatic, cervical, head and neck, ovarian cancer, melanoma, lymphoma, glioma or multidrug resistant cancer. The method involves use of other drug therapies such as monoclonal antibodies, REL-A-specific inhibitors or chemotherapy including paclitaxel, docetaxel, cisplatin, methotrexate, cyclophosphamide, doxorubin, fluorouracil carboplatin, datrexate, gemcitabine or radiation therapy. The enzymatic and antisense nucleic acid molecules are also useful for treating inflammatory disease such as
                                                                                                                                                                                                                                                                                                                                                                                                                              Fig
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            oesophageal cancer; stomach cancer; bladder cancer; pancreatic cancer; cervical cancer; head and neck cancer; ovarian cancer; melanoma; lymphoma; glioma; multidrug resistant cancer; REL-A-specific inhibitor; chemotherapy; paclitaxel; docetaxel; cisplatin; methotrexate; cyclophosphamide; doxorubin; fluorouracil carboplatin; edatrexate; gemcitabine; radiation therapy; inflammatory disease; asthma; diabetes; rheumatoid arthritis; restenosis; Crohn's disease; obesity; ischaemia; gene therapy; autoimmune disease; lupus; multiple sclerosis; sepsis; transplant/graft rejection; reperfusion injury; glomerulonephritis; allergic airway inflammation; inflammatory bowel disease; infection;
                                                                                                                                                                                                                                                                                                                   The invention describes an enzymatic nucleic acid molecule (I) which down regulates expression of a sequence encoding a subunit of nuclear factor kappa B (NFKB), where (I) is an inozyme, zinzyme, G-cleaver or amberzyme configuration. The enzymatic nucleic acid molecule is adapted to treat cannot and in the configuration.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Novel enzymatic nucleic
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (STIN/)
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18-MAY-1994;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Necrosis factor kappa B (NFKB) modulating DNAzyme motif.
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                                         rheumatoid arthritis,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                23-DEC-1996;
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                                                                                                                                                                                                                                                                                                                                                                                                                              4; SEQ ID NO 3928; 72pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  eaver; amberzyme; cancer; REL-A activity; breast cancer;
cancer; prostate cancer; colorectal cancer; brain cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      l enzymatic nucleic acid molecules which down regulates expression sequence encoding a subunit of nuclear factor kappa B useful for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DRAPER K G.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        STINCHCOMB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cancer, inflammatory disorders and autoimmune diseases
                       autoimmune disease,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
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92US-0987132.
94US-0245466.
96US-0777916.
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mune disease, lupus, m
therapy applications,
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                                       restenosis, asthma, Crohn's disease, diabetes,
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                  multiple sclerosis, transplant/graft
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RESULT 10
ABZ58432
ID ABZ58
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The present sequence is an example of a DNAzyme, an enzymatic CC nuclear acid (ENA) that does not require the presence of a 2'-OH CC group for its activity. DNAzymes can be used as the ENA moiety in CC novel ENA peptide conjugates (I) of the invention that facilitate CC delivery of molecules into biological systems, such as cells. The peptide part of the conjugate is typically a fusogenic peptide such cC used to treat a cancer patient, where the cancer is breast, lung, CC colorectal, brain, oesophageal, stomach, bladder, pancreas, curvix, head and neck or ovary cancer, melanoma, lymphoma, glioma or CC the virus is HIV, hepatitis B virus, hepatitis C virus, cc the virus is HIV, hepatitis B virus, hepatitis C virus, cous sarcoma virus, hepatitis C virus, foot and mouth disease virus or papilloma virus, Ebola virus, foot and mouth disease virus or papilloma virus, incleosides, nucleic acid molecules, lipids, peptides, proteins and/or non-nucleosidic small molecules, linto a cell and to detect the presence of a target molecule in a biological system such as cc tissue, cell or cell lysate. They are useful as diagnostic tools to examine genetic drift and mutations within diseased cells or to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Matches
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                New transporter compounds useful for biological system such as cells, and infections -
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (central nervous system (CNS) and myocardial), glomerulonephritis, sepsis, allergic airway inflammation, inflammatory bowel disease or infection. This sequence represents a motif of an enzymatic nucleic used to modulate the function of a necrosis factor kappa B sub-unit.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Beigelman L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  30-JAN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DNAzyme; enzymatic nucleic acid; enzyme; transporter; delivery; cytostatic; virucide; gene therapy; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DNAzyme motif.
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                                                                                                                                                                                                                                                                                                                                                                             Disclosure; Fig 4; 88pp; English
                                                                                                                                                                                                                                                                                                                                                                                                              infections
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2003-247828/25
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (RIBO-) RIBOZYME PHARM INC
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16; Conser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           RGGCTAGCTACAACGA 16
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Pred. No. 34;
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                                                                                                                                                                                                                                                                                                                                                                                                                            delivering molecules into for treating cancer and v
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                                                 Query Match
Best Local S
Matches 15
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Best Local (
                                                                                                                                                     The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ra human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ64543, ABZ65532 - ABZ65519,
                                                                                                                                                                                                                                                                                                                             Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences -
                                                                                                                                                                                                                                                                                                                                                                                                                                                              29-MAY-2001; 2001US-294140P.
06-JUN-2001; 2001US-296249P.
10-SEP-2001; 2001US-318471P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            detect the presence of a disease-related RNA in a
                                                                                                      Sequence 27
                                                                                                                                                                                                                                                                                                                                                                                                            Mcswiggen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             05-DEC-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human HER2 synthetic DNAzyme #1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ABZ66525;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABZ66525 standard; RNA;
                                                                                                                                            ABZ66525 - ABZ66529,
                                                                                                                                                                                                                                                                                                    Claim 3; Page 153; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2003-140484/13
                                                                                                                                                                                                                                                                                                                                                                                                                                      (RIBO-) RIBOZYME
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   29-MAY-2002; 2002WO-US16840
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WO200297114-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          anti-rheumatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        21-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Local
                                                  15;
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σ
                        μ
                                                                Similarity
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                        RGGCTAGCTACAACGA 16
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AGGCTAGCTACAACGA 21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP; 5
                                                  Conservative
                                                                                                     BP; 6 A; 6 C; 10 G; 2 T; 3 U; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                      PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 A; 4 C; 4 G; 2 T; 1 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        entry.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          97.5%;
                                                                                                                                            ABZ66586 - ABZ66658 represent human ribozymes of
                                                             97.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             27
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            16
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                                                               Score 15.6;
Pred. No. 35
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 15.6; D
Pred. No. 34;
                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mismatches
                                                                35;
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                                                                           Bd
                                                                           25;
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                                                 0,
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                                                  Indels
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                                                 <u>.</u>
                                                 Gaps
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                                                                                                                                                                                                                                                 N-Ras,
                                                                                                                                            the
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RESULT 13
AAZ34361
ID AAZ34
XX
AC AAZ34
XX
DT 14-DE
XX
DE Nucle
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ABZ66527
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                                                                                                                                                                                                                                                                       Matches
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Best Local :
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06-JUN-2001;
10-SEP-2001;
                                                                                                                                                                                                                                                                                                            acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-luman immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ64543, ABZ65532 - ABZ66529, ABZ66529, ABZ66528 - ABZ66528 - ABZ66529, ABZ66528 - ABZ66529, ABZ66528 - ABZ66528 - ABZ66529, ABZ66529, ABZ66528 - ABZ66528 represent human ribozymes of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                             14-DEC-1999
                                                        AAZ34361;
                                                                                                                                                                                                                                                                       Sequence 27 BP; 11 A; 8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human HER2 synthetic DNAzyme
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                                                                                  AAZ34361 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                            The invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 3; Page 153; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2003-140484/13
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                        σ
                                                                                                                                                                                    1 RGGCTAGCTACAACGA 16
                                                                                                                                                                                                              Similarity
15; Conserv
                                                                                                                                                         AGGCTAGCTACAACGA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ; 2001US-294140P.
; 2001US-296249P.
; 2001US-318471P.
                                                                                                                                                                                                                Conservative
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                            (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                            relates to a novel short interfering
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              RNA;
                                                                                    DNA;
                                                                                                                                                                                                                         97.5%;
                                                                                                                                                                                                                                                                       C; 6
                                                                                    29
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              27
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                                                                                                                                                                                                                                                                       G; 2 T; 0 other;
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                                                                                                                                                                                                                               Pred.
                                                                                                                                                                                                                                          Score 15.6;
                                                                                                                                                                                                                Mismatches
                                                                                                                                                                                                                               No.
                                                                                                                                                                                                                               35;
                                                                                                                                                                                                                                          DB 25;
                                                                                                                                                                                                                <u>,,</u>
                                                                                                                                                                                                                Indels
                                                                                                                                                                                                                                          Length
                                                                                                                                                                                                                                                                                                                 human ribozymes of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                            RNA (siRNA) nucleic
                                                                                                                                                                                                                                          27;
                                                                                                                                                                                                                ٥,
                                                                                                                                                                                                                Gaps
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Nucleic acid-based diagnostic exemplification oligonucleotide #23.

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RESULT 14
AAZ34363
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      cc subject is afficited with a disorder characterised by the presence of cx subject is afficited with a disorder characterised by the presence of solated sample from the subject, the nucleic acid segment that, in an cx affected individual contains (A), (ii) treating the amplifons with a cx catalytic nucleic acid (I) that specifically recognizes and cleaves a cx target sequence present in either the mutated or wild-type segments, cx target sequence present in either the mutated or wild-type segments, cx target sequence present in either the mutated or wild-type segments, cx target sequence concurrently with (i). The method is specifically cx (ii) may be performed concurrently with (i). The method is specifically cx syndrome and cystic fibrosis. (I) recognises as few as two by to create cx syndrome and cystic fibrosis. (I) recognises as few as two by to create cx cleavage site (contrast at least 4 by required by enzymes used in cx cleavage site (contrast at least 4 by required by enzymes used in cx cleavage site of contrast at least 4 by required anylysis; such sites cx primers can be used to induce cleavage sites for (I). The method is contentially more flexible than RELP and does not require any enzymes or cx contentially more flexible than RELP and does not require any enzymes cx cx equences used in the exemplification of the present invention.
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Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                                            Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Catalytic nucleic acid-based diagnostic method; determination; AIDS; mutation; ribozyme; target; cleavage; amplification; PCR primer; probe; cancer; human immune deficiency virus; cystic fibrosis; HIV; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Todd
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WO9950452-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Detecting diseases associated with a known mutation by amplification and cleavage with catalytic nucleic acids, particularly for cancer, human immune deficiency virus and cystic fibrosis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (JOHJ ) JOHNSON & JOHNSON RES
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    The present invention describes a method for determining whether a subject is afflicted with a disorder characterised by the presence of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 29 BP; 10 A; 5 C; 10 G; 3 T; 1 other;
                                                                                                                                                                       14-DEC-1999
                                                       Catalytic nucleic acid-based diagnostic method; determination; AIDS; mutation; ribozyme; target; cleavage; amplification; PCR primer; probe; cancer; human immune deficiency virus; cystic fibrosis; HIV; ss.
                                                                                                                                Nucleic acid-based diagnostic exemplification oligonucleotide #25.
                                                                                                                                                                                                                                                  AAZ34363 standard;
                  Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                              Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                            15;
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                                                                                                                                                                                                                                                                                                                                                                                       RGGCTAGCTACAACGA 16
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                                                                                                                                                                                                                                                                                                                                                  AGGCTÁGCTÁCAACGA 23
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Page 20; 57pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                           (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                98US-0079651.
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                                                                                                                                                                                                                                                      DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                              97.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                            Score 15.6; D
Pred. No. 35;
1; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 20;
                                                                                                                                                                                                                                                                                                                                                                                                                                  0;
                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                    0
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The present invention describes a method for determining whether a CC subject is afflicted with a disorder characterised by the presence of cx a known nucleic acid. The method comprises: (1) amplifying, in an CC isolated sample from the subject, the nucleic acid segment that, in an CC affected individual contains (A), (ii) treating the amplicons with a CC catalytic nucleic acid (I) that specifically recognizes and cleaves a CC catalytic nucleic acid (I) that specifically recognizes and cleaves a CC catalytic nucleic acid (I) that specifically recognizes and cleaves a CC contain the segment in either the mutated or wild-type segments, the nucleic acid segment in the precision of the method is specifically (I) may be performed concurrently with (i). The method is specifically CC used to diagnose cancer (especially), acquired immune deficiency CC syndrome and cystic fibrosis. (I) recognises as few as two bp to create a cleavage site (contrast at least 4 bp required by enzymes used in CC restriction fragment length polymorphism (RFLP) analysis); such sites ccur more fragment length polymorphism (RFLP) analysis); such sites ccur more fragment length polymorphism (RFLP) analysis); such sites cour more fragment length polymorphism (RFLP) analysis); such sites cour more fragment length polymorphism (RFLP) analysis); such sites cour more fragment length polymorphism (RFLP) analysis); such sites cour compounds. ANZ34339 to ANZ34450 represent oligonucleotide course used in the exemplification of the present invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        07-OCT-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Detecting diseases associated with a known mutation by amplification and cleavage with catalytic nucleic acids, particularly for cancer, human immune deficiency virus and cystic fibrosis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WO9950452-A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; Page 20; 57pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 1999-591332/50.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Todd AV, Fuery CJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (JOHJ ) JOHNSON & JOHNSON RES PTY LTD.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         27-MAR-1998;
                               Sequence
                                  29 BP; 7 A;
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                                    10 C; 5 G; 7 T; 0 other;
29;
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RESULT 15
AAC82623
ID AAC82
                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local S
                                                                                                                                                                                                                                                                                                                                 Matches
                                                                                                                                                    Hammerhead ribozyme DNA motif #23.
                                                                                                                                                                                                                          AAC82623 standard; DNA; 29 BP
                                                                                           Synthetic
                                                                                                                                                                             13-MAR-2001
                                                                                                                                                                                                    AAC82623;
26-MAR-1999;
                                                                                                                               Detection;
                       26-MAR-1999;
                                               28-SEP-2000.
                                                                       DE19915141-A1
                                                                                                                    fluorescent
                                                                                                                                                                                                                                                                                      9
                                                                                                                                                                                                                                                                                                          μ
                                                                                                                                                                                                                                                                                                                                 l Similarity
15; Conserv
                                                                                                                                                                                                                                                                                                   RGGCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                                     AGGCTAGCTACAACGA 24
                                                                                                                     amplification; pathoge
: signal; cleavage; ss
                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                             (first entry)
   99DE-1015141
                          99DE-1015141
                                                                                                                                pathogenic bacteria;
                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                      0;
                                                                                                                                     hammerhead ribozyme;
                                                                                                                                                                                                                                                                                                                                          0
                                                                                                                                                                                                                                                                                                                                          Gaps
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밁 8

97.5%;

Score 15.6; Pred. No. 39

35; DB 20;

Length

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RESULT 16
ABZ66526
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     CC quantitative real-time determination for the amplification and CC quantitative real-time determination function acid (I) using a primer CC attached to a 1-40 nucleotide sequence (II) in the transcription product. CC Amplification is done in the presence of an excess, preferably 50-500 nM, CC of a nucleicated probe (III) and labeled by a reporter molecule and a CC quencher molecule. (I) encodes the motif 5'-GAAA-3' (A), and (II) CC contains the motif 5'-GUGANCA-3' (B). (III) has 25-60, especially 50, CC quantification of (I), particularly RNA by NASBA (RTM) (nucleic acid contains the method allows real-time detection and CC quantification of (I), particularly RNA by NASBA (RTM) (nucleic acid esquence-based amplification), without the difficulties associated with CC use of DNA probes (see Nucleic Acid Res., 26 (1998) 2150) and is suitable CC for routine use. Specifically the combination of (A) and (B) generates a CC hammerhead ribozyme that cleaves the probe and generates a fluorescent CC signal. Since many probes are cleaved, a high signal is produced, CC resulting in high sensitivity and shorter reaction times. The method is correctly specific since exact hybridization of probe to target is necessary CC for routine usits of dissociation of the probe from the target (which CC cleavage results in dissociation of the probe from the target (which CC consisting mainly of 2'-deoxyribonucleotides.
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                                             29-MAY-2001;
06-JUN-2001;
10-SEP-2001;
                                                                                                                                                                                                                                             Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; antianti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Real-time quantitative amplification of nucleic acid, useful for detecting bacterial pathogens, uses primer and labeled probe that combine to form a ribozyme -
                                                                                                             29-MAY-2002; 2002WO-US16840.
                                                                                                                                                 05-DEC-2002
                                                                                                                                                                               WO200297114-A2
                                                                                                                                                                                                               Homo sapiens
                                                                                                                                                                                                                                                                                                                 Human HER2 synthetic DNAzyme #2.
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               (RIBO-) RIBOZYME PHARM INC
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                                             ; 2001US-294140P.
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; 2001US-318471P.
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06-JUN-2001;
10-SEP-2001;
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                                                  Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                                                                              Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
anti-rheumatic; cancer; AIDS; ss.
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                                                                                                                                                                                                                                                                                                                                    Homo sapiens.
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nilarity 93.8%;
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Pred. No. 3
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The invention relates to a novel short interfering RNA (siRNA) nucleic

Claim 3; Page 153; 185pp; English.

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06-JUN-2001;
10-SEP-2001;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
                           The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ra human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV acidity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ64543, ABZ65532 - ABZ65519,
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                                                                                                                                                                                                               Claim 3; Page
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                 The sequences shown in
ABZ66525 - ABZ66529, AE
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; 2001US-318471P.
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06-JUN-2001;
10-SEP-2001;
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Pred. No. 35;
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
anti-rheumatic; cancer; AIDS; ss.
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06-JUN-2001; 2001US-296249P.
10-SEP-2001; 2001US-318471P.
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                         Human HIV enzymatic nucleic acid
                                                                           21-MAR-2003
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                                                                                                                                                                                                                                                                                             GGGCTAGCTACAACGA 22
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29-MAY-2002; 2002WO-US16840.
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                                                                                                 WO200297114-A2
                                                                                                                                            Homo sapiens
                                                                                                                                                                                              anti-rheumatic;
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The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ64543, ABZ65532 - ABZ65519, ABZ66525 - ABZ66529, ABZ66529, ABZ66528 - ABZ66529, ABZ66529, ABZ66528 - ABZ66529, ABZ66529, ABZ66529 - ABZ66529, ABZ66529 - ABZ66529, ABZ66529 - ABZ66529, ABZ66529, ABZ66529 - ABZ66529, ABZ6
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                                 Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
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06-JUN-2001; 2001US-296249P
10-SEP-2001; 2001US-318471P
                                                                                                                                 Human HIV enzymatic nucleic acid #4.
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cancer; AIDS;
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06-JUN-2001;
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enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
                             WPI; 2003-140484/13.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ra human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ62217 - ABZ64543, ABZ65532 - ABZ65519,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               hair loss, atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Catalytic DNA; catalytic RNA; hairless protein; 88;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               hair follicle;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABZ66525
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Homo sapiens
                                                                                                                                                                                 Christiano
                                                                                                                                                                                                                                                                                  13-APR-2001;
                                                                                                                                                                                                                                                                                                                                     12-APR-2002;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               29
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cleaving hairless protein mRNA after nucleotide 1594.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Location/Qualifiers 8..22
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/note=
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                "Catalytic domain"
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Pred. No. 35
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     hair removal product;
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New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase to catagen phase

2003-093020/08

Claim 3;

Page

34; discloses

65pp; English.

invention

a new catalytic DNA or RNA molecule that

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RESULT 25
ABX13989
ID ABX13989
ID ABX13
XX ABX13
XX Deoxy
XX Catal
XW Catal
XW hair
XW riboz
XW catal
XW hair
XW depil
XX Homo
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Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          a self-catalytic enzymatic function and sequence specific RNA binding ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless gene due to inherited mutations leads to the complete loss of hair, known as atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have
                                                        13-APR-2001; 2001US-283618P.
                                                                                               12-APR-2002;
                                                                                                                                      24-OCT-2002
                                                                                                                                                                            WO200283891-A2
                                                                                                                                                                                                                                                     misc_feature
                                                                                                                                                                                                                                                                                                                Synthetic
                                                                                                                                                                                                                                                                                                                                 Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                         depilatory.
                                                                                                                                                                                                                                                                                                                                                                                      ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Catalytic DNA; catalytic RNA; hairless protein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide 1597
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ABX13989;
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                      (UYCO ) UNIV COLUMBIA NEW YORK
                                                                                                                                                                                                                                                                                                                                                                                                                                                     hair loss; atrichia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            human hairless protein mRNA immediately after nucleotide 1594.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              15;
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/*tag=_a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              97.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                 hair growth; hirsutism; catalytic nucleic acid;
                                                                                                                                                                                                               "Catalytic domain"
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Pred. No. 35;
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CC which comprises a catalytic domain that cleaves mRNA at a defined CC consensus sequence and binding domains contiguous with the 5' and 3' ends CC consensus sequence and binding domains contiguous with the 5' and 3' ends CC inherited mutations leads to the complete loss of hair, known as a trichia. Abundant hair growth, hirsutism, can be improved by inhibiting CC the genes promoting hair growth, and one way to get targeted, transient CC gene suppression is through the use of catalytic nucleic acid technology. CC including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding CC ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have core lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing thair removal products which function by inhibiting hairless protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             New catalytic nucleic acid molecule that specifically cleaves Hairless protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
Sequence 29 BP; 7 A; 9 C; 10 G; 3 T; 0 other;
                                                   expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1597.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Claim 3; Page 34; 65pp; English.
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RESULT 26
ABX13990
ID ABX13990
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ID ABX13900
ID ABX13900
AC ABX13
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid;
ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme;
catalytic core; cleavage site; pharmaceutical; hair production;
hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                    misc_feature
                                                                                                                                                                                                                                                                                                                          Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Catalytic DNA; catalytic RNA; hairless protein; ss;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Deoxy-ribozyme,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   25-FEB-2003 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABX13990 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                        Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                               depilatory.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AGGCTAGCTACAACGA 22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    cleaving hairless protein mRNA after nucleotide 1641.
                                                                                                                                                                                                    Location/Qualifiers
8..22
                                                                                                                             /note= "Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              97.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 25;
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WO200283891-A2

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AC ABX
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DE Deo
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Cat
KW hai
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KW cat
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OS Syn
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       RESULT 27
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    CC of the catalytic domain. Lack of expression of the hairless gene due to conherited mutations leads to the complete loss of hair, known as cc atrichia. Abundant hair growth, hisuitism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gree suppression is through the use of catalytic nucleic acid technology, c including ribozymes and DNAzymes. Ribozymes are RNA structures which have a sali-catalytic enzymatic function and sequence specific RNA binding c ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a ccatalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen c phase. A non-human transgenic mammal is useful as a model for testing c expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1641.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
Best Local (
  Homo sapiens
Synthetic.
                                                               depilatory.
                                                                             ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; decxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                          Catalytic DNA;
hair loss; atri
                                                                                                                                                                                                     Deoxy-ribozyme,
                                                                                                                                                                                                                                             25-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless and a defined the catalytic domain.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                                                                                                                                     ABX13991
                                                                                                                                                                                                                                                                                                                           ABX13991 standard; DNA; 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 3; Page 34; 65pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           to catagen phase
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                 RGGCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                AGGCTAGCTACAACGA 22
                                                                                                                                        DNA; catalytic RNA; hairless protein; ss; atrichia; hair growth; hirsutism; cataly
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       BP; 7 A; 11 C; 7 G; 4 T; 0 other;
                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           discloses
                                                                                                                                                                                                   cleaving hairless protein mRNA after nucleotide 1698
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            97.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           a new catalytic DNA or RNA molecule that
                                                                                                                                                                                                                                                                                                                             ВP
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Pred. No. 3
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                                                                                                                                          catalytic nucleic acid;
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                                                                                                                                                                                                                                                                                                       Matches
                                                                                                                                                                                                                                                                                                                        Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                          are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1698.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                               Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide 1732
                                                                     25-FEB-2003
                                                                                                                                          ABX13992 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                            Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 3; Page 34; 65pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              The invention discloses a new catalytic DNA or RNA molecule that
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Pred. No. 3
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Catalytic DNA; catalytic RNA; hairless protein;

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RESULT 29
ABX13993
ID ABX13
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                                                                                                                                                                      Query Match
Best Local S
Matches 15
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ABX13993 standard; DNA; 29 BP
                                                                                                                                                                                                                                                Sequence
                                                                                                                                                                                                                                                                                    are useful in pharmaceutical compositions for inhibiting hair production by a hair-producting cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1732.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      specifically cleaves, or inhibits expression of, Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' ends
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; decay-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        of the catalytic domain. Lack of expression of the hairless gene due to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention discloses a new catalytic DNA or RNA molecule that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Claim 3; Page 34; 65pp; English
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                                                                                                                                                                                          Similarity
                                                                                                                  RGGCTAGCTACAACGA 16
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                                                                                                                                                                                                                                                  BP; 6
                                                                                                                                                                        Conservative
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93.8%;
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                                                                                                                                                                      Score 15.6; I
Pred. No. 35;
1; Mismatches
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Consensus sequence and binding domains contiguous with the 5' and 3' ends continents to the catalytic domain. Lack of expression of the hairless gene due to Cinherited mutations leads to the complete loss of hair, known as CC atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting CC the genes promoting hair growth, and one way to get targeted, transient CC gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding CC ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a CC catalytic core and two sequence specific arms. The deoxy-ribozymes have commended, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair growth and for inhibiting base. A non-human transgenic mammal is useful as a model for testing the transition of a hair follicle from the anagen phase to the catagen caphase. A non-human transgenic mammal is useful as a model for testing thair removal products which function by inhibiting hairless protein caphase. A non-human transgenic mammal is useful as a model for testing thair removal products which function by inhibiting hairless protein caphase. The deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1750.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein which comprises a catalytic domain that cleaves mRNA at a defined
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
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/note= "Catalytic domain"
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Matches Query Match Best Local :

. Similarity

Conservative

97.5%; 9 C; 7

Length Indels

0,

Gaps

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Sequence

29

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G; 5 T; 0 other; Score 15.6; Pred. No. 35 Mismatches 35; DB 25; 0

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RGGCTAGCTACAACGA 16

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RESULT 30
ABX13994
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       The invention discloses a new catalytic DNA or RNA molecule that C specifically cleaves, or inhibits expression of, Hairless Protein mRNA c which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5 and 3 ends c of the catalytic domain. Lack of expression of the hairless gene due to c inherited mutations leads to the complete loss of hair, known as c atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient c gene suppression is through the use of catalytic nucleic acid technology, c including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding c ability. Small DNA oligonuclectides that have a similar structure to the catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producting cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen c phase. A non-human transgenic mammal is useful as a model for testing thair removal products which function by inhibiting hairless protein
                                                                                                                                                                                                                                                                                                                                                                                                                                      Claim 3; Page 34; 65pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            to catagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Protein mRNA, useful for inhibiting cell, or for inhibiting transition
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2003-093020/08
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Christiano AM;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Catalytic DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Deoxy-ribozyme,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        13-APR-2001; 2001US-283618P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (UYCO ) UNIV COLUMBIA NEW YORK
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           catalytic nucleic acid molecule that specifically cleaves Hairless tein mRNA, useful for inhibiting hair production by a hair-producing l, or for inhibiting transition of a hair follicle from anagen phase
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DNA; catalytic RNA; hairless protein; ss; atrichia; hair growth; hirsutism; catalytic nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Location/Qualifiers 8..22
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/note= "Catalytic domain"
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presented is the
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deoxy-ribozyme that cleaves the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             nucleotide 1801
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RESULT 31
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                      specifically cleaves, or inhibits expression of Hairless Protein mRNA which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless gene due to inherited mutations leads to the complete loss of hair, known as atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, translent gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and NNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding ability. Small DNA oligonucleotides that have a similar structure to the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Catalytic DNA; catalytic RNA; hairless protein; 88; hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                        New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                                                                            Claim 3; Page 35; 65pp; English.
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'note= "Catalytic domain"
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                 called deoxy-ribozymes or DNAzymes, having a
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Pred. No. 3
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            The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein mRN which comprises a catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' of the catalytic domain. Lack of expression of the hairless gene due
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 1811.
                                                                                                                                                                New catalytic nucleic acid molecule that specifically cleaves Hairless protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
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                                                                                                                                                                                                                                                                          Christiano
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                                                                                                                                                                                                                                                                                                                                                                                                                                                WO200283891-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        depilatory.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Deoxy-ribozyme,
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                                                                                                                                                    catagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        follicle; anagen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Similarity
                                                                                                                                                                                                                                                                                                            UNIV COLUMBIA NEW YORK
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                                                                                                                                                                                                                                                                          AM
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 9 A; 9 C; 9 G; 2 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          cleaving hairless protein mRNA after nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      8..22
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                note=
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  "Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ļ.
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Pred. No. 3
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                                                                                                                                                                hair-producing
om anagen phase
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                            and 3' ends
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                                                                  mRNA
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RESULT 33
ABX13997
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Best Local Similarity
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                            New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           hair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; bnazyme; self-catalytic; hammerhead ribozyme; decay-ribozy; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ABX13997 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence
               to catagen phase
                                                                                                WPI; 2003-093020/08.
                                                                                                                                   Christiano AM
                                                                                                                                                                                                     13-APR-2001; 2001US-283618P.
                                                                                                                                                                                                                                                                                                                                                                      misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                         Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                        Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Catalytic DNA; catalytic RNA; hairless protein; ss;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Deoxy-ribozyme,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                25-FEB-2003
                                                                                                                                                                                                                                  12-APR-2002; 2002WO-US11683
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     15;
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                                                                                                                                                                     UNIV COLUMBIA NEW YORK.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               cleaving hairless protein mRNA after nucleotide
                                                                                                                                                                                                                                                                                                                                                                      Location/Qualifiers 8...22
                                                                                                                                                                                                                                                                                                                                     /*tag= a
/note= "Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     97.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      7 C; 13 G; 3 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 15.6;
Pred. No. 35
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       35;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 25;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               deoxy-ribozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       <u>,,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 2033.
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Claim 3; Page

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ribozyme; atrichia; hair growth; hisutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase.
                                                                                                                                                                                                                                                                                                        25-FEB-2003
                                                                                                                                                                                                                                                                                  Deoxy-ribozyme, cleaving hairless protein mRNA after nucleotide 2047
                                                                                                                                                                                                                                                                                                                                                 ABX13998 standard; DNA; 29
Christiano
                                                                                                                                             misc_feature
                                                                                                                                                                             Synthetic
                                       13-APR-2001; 2001US-283618P.
                                                                                                      WO200283891-A2
                                                                                                                                                                                       Homo sapiens.
                   (UYCO ) UNIV COLUMBIA NEW YORK
                                                           12-APR-2002; 2002WO-US11683
A
                                                                                                                                                                                                                                                                                                        (first entry)
                                                                                                                                   8..22
/*tag=
                                                                                                                                                        Location/Qualifiers
                                                                                                                           /note= "Catalytic domain"
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consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless gene due to inherited mutations leads to the complete loss of hair, known as inhibiting atrichia. Abundant hair growth, hirsuitism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in nharmacantical components of the interticulations.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing hair removal products which function by inhibiting hairless protein expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 2033.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          specifically cleaves,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    RGGCTAGCTACAACGA 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 7 A; 5 C; 13 G; 4 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        eaves, or inhibits expression of, Hairless Protein a catalytic domain that cleaves mRNA at a defined
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            97.5%;
93.8%;
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Pred. No. 3
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RESULT 35
ABX13999
ID ABX13
XX ABX13
XX ABX13
XX Deoxy
XX Catal
XW Catal
XW
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Best Local
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                                                                                                                                                                                                                                                                                                  Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                  depilatory.
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                                                                                                                                                                                           misc_feature
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7

Matches Query Match Best Local

Local 15;

Sequence 29

New catalytic nucleic acid molecule that specifically cleaves Hairless protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase to catagen phase

Claim 3; Page 35; 65pp; English

Consensus sequence and binding domains contiguous with the 5' and 3' ends co f the catalytic domain. Lack of expression of the hairless gene due to conherited mutations leads to the complete loss of hair, known as catalytic bundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient concluding ribozymes and DNAzymes are RNA structures which have including ribozymes and DNAzymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding catalytic core and two sequence specific arms. The doxy-ribozymes having a contralytic core and two sequence specific arms. The doxy-ribozymes have contralytic consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair folicle from the anagen phase to the catagen phase. A non-human transgenic mammal is useful as a model for testing thair removal products which function by inhibiting hairless protein the carnoval products which function by inhibiting hair less protein The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protei which comprises a catalytic domain that cleaves mRNA at a define ssion. The sequence presented is the deoxy-ribozyme that cleaves the hairless protein mRNA immediately after nucleotide 2047. Protein mRNA

Sequence 29 BP; 9 A; 10 C; 7 97.5%; 93.8%; G; 3 T; 0 other; Score 15.6; Pred. No. 35 DB 25; Length

Mismatches

0,

Indels

0

Gaps

0

1 RGGCTAGCTACAACGA 16 GGGCTAGCTACAACGA 22

hair loss; atrichia; hair growth; nirButlbu; locustyme; deoxy-ribozyme; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product; Catalytic DNA; catalytic RNA; hairless protein; ss; ABX13999 standard; DNA; 29 BP Deoxy-ribozyme, (first entry) cleaving hairless protein mRNA after nucleotide hair growth; hirsutism; catalytic nucleic acid;

2083

Homo sapiens. WO200283891-A2 Location/Qualifiers 8..22 "Catalytic domain"

24-OCT-2002.

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             CC of the catalytic domain. Lack of expression of the hairless gene due to conherited mutations leads to the complete loss of hair, known as catalytic domain hair growth, hirsuitsm, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, transient gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding cability. Small DNA oligonucleotides that have a similar structure to the chammerhead ribozyme, called deoxy-ribozymes are DNAzymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have come lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids are useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting the transition of a hair follicle from the anagen phase to the catagen chair removal products which function by inhibiting hairless protein the expression. The sequence presented is the deoxy-ribozyme that cleaves the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local
                                                                                 nair loss; atrichia; hair growth; hirsutism; catalytic nucleic acid; ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase: catagen phase.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention discloses a new catalytic DNA or RNA molecule that specifically cleaves, or inhibits expression of, Hairless Protein which comprises a catalytic domain that cleaves mRNA at a defined
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mXNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
               Homo sapiens
Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 3; Page 35; 65pp; English
                                                                    depilatory.
                                                                                                                                                                                                    Deoxy-ribozyme,
                                                                                                                                                                                                                                         25-FEB-2003
                                                                                                                                                                                                                                                                              ABX14001;
                                                                                                                                                                                                                                                                                                               ABX14001 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 29
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  13-APR-2001; 2001US-283618P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       12-APR-2002; 2002WO-US11683
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               human hairless protein mRNA immediately after nucleotide 2083.
                                                                                                                                                                                                                                                                                                                                                                                                            7
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    15;
                                                                                                                                                                                                                                                                                                                                                                                                                                               1 RGGCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               UNIV COLUMBIA NEW YORK.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Similarity
                                                                                                                                                                                                                                                                                                                                                                                                          GGGCTAGCTACAACGA 22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         sequence and binding domains contiguous with the 5' and 3' ends
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 9 A; 7 C; 9 G; 4 T; 0 other;
                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                  cleaving hairless protein mRNA after nucleotide 2380
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    97.5%;
                                                                                                                                                                                                                                                                                                                 29
                                                                                                                                                                                                                                                                                                                 ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 15.6;
Pred. No. 35;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     25;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       29;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                mRNA
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CC specifically cleaves, or inhibite expression of, Hairless Protein mRNA CC which comprises a catalytic domain that cleaves mRNA at a defined CC consensus sequence and binding domains contiguous with the 5' and 3' ends of the hairless gene due to of the catalytic domain. Lack of expression of the hairless gene due to CC inherited mutations leads to the complete loss of hair, known as CC atrichia. Abundant hair growth, hirsuitsm, can be improved by inhibiting CC the genes promoting hair growth, and one way to get targeted, transient CC gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding CC ability. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, that have a similar structure to the catalytic core and two sequence specific arms. The deoxy-ribozymes have care useful in pharmaceutical compositions for inhibiting hair production by a hair-producing cell, for inhibiting hair growth and for inhibiting that growth and for inhibiting care expression. The sequence presented is the deoxy-ribozyme that cleaves the human hairless protein mRNA immediately after nucleotide 2380.
  New catalytic nucleic acid molecule that specifically cleaves Hairless Protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
Sequence 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 3; Page 35; 65pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        to catagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2003-093020/08.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Key
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Christiano AM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (UYCO ) UNIV COLUMBIA NEW YORK
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  13-APR-2001; 2001US-283618P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 24-OCT-2002.
BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               discloses a new catalytic DNA or RNA molecule that
6 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    8..22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               /note= "Catalytic domain"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  /*tag=
10 C; 8 G; 5 T; 0 other;
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RESULT 37
ABX14002
                                                                                          Ś
문
                                                                                                      Matches
                                                                                                            Query Match
Best Local
                                        ABX14002
                                                   ABX14002 standard; DNA; 29
                                                                                                      15;
                                                                                7
                                                                                          ب
                                                                                                            Similarity
                                                                                      RGGCTAGCTACAACGA 16
                                                                                                      Conservative
                                                                                                                 97.5%;
                                                                                                            93.8%;
                                                                                22
                                                                                                            Score 15.6;
Pred. No. 3
                                                                                                       Mismatches
                                                                                                             35;
                                                                                                                  DB 25;
                                                                                                      0;
                                                                                                       Indels
                                                                                                                 Length
                                                                                                                  29;
                                                                                                      0
                                                                                                       Gaps
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Catalytic DNA; catalytic RNA; hairless protein; ss; hair loss; atrichia; hair growth; hirsutism; cataly

catalytic nucleic acid;

Deoxy-ribozyme, 25-FEB-2003

cleaving hairless protein mRNA after

nucleotide

(first entry)

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B
                             S
                                                                                                                                                                which comprises a catalytic domain that cleaves mRNA at a defined of the catalytic domain that cleaves mRNA at a defined consensus sequence and binding domains contiguous with the 5' and 3' ends of the catalytic domain. Lack of expression of the hairless gene due to of the catalytic domain beach of the complete loss of hair, known as atrichia. Abundant hair growth, hirsutism, can be improved by inhibiting the genes promoting hair growth, and one way to get targeted, translent gene suppression is through the use of catalytic nucleic acid technology, including ribozymes and DNAzymes. Ribozymes are RNA structures which have a self-catalytic enzymatic function and sequence specific RNA binding a billity. Small DNA oligonucleotides that have a similar structure to the hammerhead ribozyme, called deoxy-ribozymes or DNAzymes, having a catalytic core and two sequence specific arms. The deoxy-ribozymes have more lenient consensus cleavage site requirements and are less likely to degrade, in vivo, that hammerhead ribozymes. The catalytic nucleic acids catalytic core and teally for inhibiting for inhibiting hair production by a hair-production cell, for inhibiting hair growth and for inhibiting hair production by a hair products which function by inhibiting hairless protein mRNA immediately after nucleotide 2395. human hairless protein mRNA immediately after nucleotide 2395.
                                                                  Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New catalytic nucleic acid molecule that specifically cleaves Hairless protein mRNA, useful for inhibiting hair production by a hair-producing cell, or for inhibiting transition of a hair follicle from anagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 3; Page 35; 65pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 2003-093020/08.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Christiano
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         24-OCT-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WO200283891-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens.
Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ribozyme; DNAzyme; self-catalytic; hammerhead ribozyme; deoxy-ribozyme; catalytic core; cleavage site; pharmaceutical; hair production; hair follicle; anagen phase; catagen phase; hair removal product;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        to catagen phase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (UYCO') UNIV COLUMBIA NEW YORK.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 13-APR-2001; 2001US-283618P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        depilatory.
                                                                                                                                      Sequence 29
                                                                  15;
7
                                 μ
                                                                                      Similarity
                                 RGGCTAGCTACAACGA 16
GGGCTAGCTACAACGA
                                                                                                                                        BP; 9 A; 9 C; 8 G; 3 T; 0 other;
                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    discloses a new catalytic DNA or RNA molecule that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Location/Qualifiers
8..22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               /note= "Catalytic domain"
                                                                                   97.5%;
22
                                                                  ۳.
                                                                                      Score 15.6;
Pred. No. 35;
                                                                      Mismatches
                                                                                                         DB
                                                                                                       25;
                                                                    0
                                                                                                       Length
                                                                      Indels
                                                                                                         29;
                                                                      0
                                                                        Gaps
                                                                      0;
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RESULT 38 AAA14525/c ID AAA14525 s XX

standard; DNA; 30

ВP

RESULT 39
AAZ87648
ID AAZ87
XX
AC AAZ87
XX
OT 09-MP

AAZ87648 standard; DNA; 30

₽P

٥,

09-MAY-2000 AAZ87648;

(first entry)

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                               Ś
                                                                                                                                                       CC gene, and a sequence of interest which produces a RNA template from the reverse transcriptase synthesises cDNA of a specified sequence. CC which the reverse transcriptase synthesises cDNA of a specified sequence. CC taking advantage of the stem-loop structure of the cDNA, which forms as CC a result of the inclusion of a inverted tandem repeat that allows the scDNA to fold back on itself, forming a double stranded DNA stem, in CC sequence of interest. The double-stranded stem contains one or more the sequence of interest. The double-stranded stem contains one or more for delivery to a cell. The vectors are is useful for producing a ssDNA cC sequence of interest, particularly a cDNA transcript, an inhibitory concleic acid molecule which is an antisense sequence or aptamer, an mENA cc transcript and a heteroduplex molecule. Inhibitory nucleic acid molecules to a target cell are useful for alleviating pathological conditions by regulating gene expression. The present oligonucleotide was used to produce a vector for use in the course of the invention.
                                                              Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                09-OCT-1998;
16-SEP-1999;
04-OCT-1999;
                                                                                                                                                                                                                                                                                                                                                                                                              The specification describes methods for producing single-stranded cDNA (sscDNA) in eukaryotic cells. They use a DNA cassette that produces sscDNA in vivo. The cassette contains the Moloney murine leukemia virus reverse transcriptase/RNase H, a bacterial restriction endonuclease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Genetic element for producing and delivering single-stranded DNA, comprises a gene encoding reverse transcriptase and a sequence of interest flanked by an inverted tandem repeat and primer binding
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Oligonucleotide 5'-polyNM-gaglink-(Pleio)-DNase-1023-B/P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAA14525
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Reverse transcriptase; RNase H; stem-loop structure; genetic element; inverted tandem repeat; vector; inhibitory nucleic acid;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   08-AUG-2000
                                                                                                                                 Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2000-317974/27.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conrad
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     20-APR-2000.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WO200022114-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    antisense sequence;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (INGE-) INGENE INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    12-OCT-1999;
   24
                                \vdash
                                                                 15;
                                                                                  Similarity
   AGGCTAGCTACAACGA
                    RGGCTAGCTACAACGA 16
                                                                                                                                   30 BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Page 45; 77pp; English.
                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  99US-0397782.
99US-0169793.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      98US-0169793.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      99WO-US23936
                                                                                                                                   տ
                                                                                                                                   A; 8 C; 8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    aptamer; gene expression; ss
                                                                               97.5%;
                                                                 1;
                                                                                                                                   G; 9 T; 0 other;
                                                                                  Score 15.6;
Pred. No. 3
                                                                     Mismatches
                                                                                                     BB
                                                                                                21;
                                                                     0,
                                                                                                  Length
                                                                     Indels
                                                                                                       30;
                                                                     0
                                                                     Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        site
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RESULT 40
AASO2302/c
ID AASO23
XX AASO23
XX AASO23
XX IS-JUL
XX SYNTHE
XX ODN; C
KW Stem-1
XW endoge
KW site-d
                                                                                                                                                                                                                                                                                       В
                                                                                                                                                                                                                                                                                                                     Ş
                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention provides novel modified ribozymes that have 3 or more pyrimidine nucleotides (PMM) in the ribozyme modified at the 2'-position, CC where the PMNs are modified to 2'-amino PMNs and the ribozymes exhibit improved stability to RNAase degradation and exhibits 85% or more CC improved stability to RNAase degradation and exhibits 85% or more CC invention are selected from rat and human protein kinase C (PKC) alpha CC ribozymes, tumour necrosis factor (TMP) alpha ribozyme, rat and human CC vascular epithelial growth factor (VEGP) ribozymes. These ribozymes can CC be used for treating or preventing a disease or condition responsive to CC an alteration in the expression of a gene, where the ribozyme is capable of cleaving the RNA transcribed from the gene. They can be used for treating or preventing a disease or condition associated with the CC proiliferation of rapidly dividing cells, e.g. cancer such as malignant CC means. They can also be used for inhibiting the proliferation of cells. The use of 2'-amino modified pyrimidine can provide ribozyme of improved Stability which retain the activity of the unmodified ribozyme. The
                                                                                                                                                                                                                                                                                                                                                          Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     protein kinase C alpha; tumour necrosis factor alpha; TNFalpha; vascular epithelial growth factor; gene expression; malignant g cell proliferation; cytostatic; human; ss.
 stem-loop; c-myc; viral gene; gene therapy; reverse transcriptio
endogenous target nucleic acid; gene inactivation; RNA splicing;
site-directed mutagenesis; cellular function interruption;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  09-DEC-1999.
                                                       ODN; oligodeoxynucleotide; inverted tandem repeat; primer binding site;
                                                                                        Synthetic oligodeoxynucleotide 5'-polyNM-gaglink-(Pleio)-DNAse-1023-B/P.
                                                                                                                            18-JUL-2001
                                                                                                                                                               AAS02302;
                                                                                                                                                                                                AAS02302 standard; cDNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Disclosure; Page 9; 93pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            for treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Novel ribozymes, used for inhibiting the proliferation of cells, e.g
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2000-147046/13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sioud
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            01-JUN-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               28-MAY-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WO9963066-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Ribozyme; hammerhead;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human short protein kinase C
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (DZIE/)
                                                                                                                                                                                                                                                                                                                                                            15;
                                                                                                                                                                                                                                                                                       œ
                                                                                                                                                                                                                                                                                                                       1 RGGCTAGCTACAACGA 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DZIEGLEWSKA H E.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       NORWEGIAN RADIUM HOSPITAL RES FOUND
                                                                                                                                                                                                                                                                                                                                                                            Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   sequence represents a human short PKCalpha DNA ribozyme
                                                                                                                                                                                                                                                                                                                                                                                                                                  30
                                                                                                                                                                                                                                                                                     AGGCTAGCTACAACGA 23
                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 7
                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            or preventing cancers
                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          98GB-0011750
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               99WO-GB01706
                                                                                                                                                                                                                                                                                                                                                                                                                                A; 11 C; 8 G; 4 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                           97.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              RNAase degradation; catalytic; PKCalpha; VEGF;
                                                                                                                                                                                                30
                                                                                                                                                                                                ВP
                                                                                                                                                                                                                                                                                                                                                                           Score 15.6; DB 21; Pred. No. 35;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (PKC) alpha DNA ribozyme
                                                                                                                                                                                                                                                                                                                                                          Mismatches
                                                                                                                                                                                                                                                                                                                                                          0
                                                                                                                                                                                                                                                                                                                                                                                             Length
                                                                                                                                                                                                                                                                                                                                                            Indels
                                     transcription; ss;
                                                                                                                                                                                                                                                                                                                                                                                               30;
                                                                                                                                                                                                                                                                                                                                                            0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           glioma;
                                                                                                                                                                                                                                                                                                                                                            Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             cancer;
                                                                                                                                                                                                                                                                                                                                                            0
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Search completed: January 21, 2004, 06:52:48 Job time : 156.5 secs

밁 Ś

24

9

Query Match Best Local S Matches 15

Similarity

97.5%;

Score 15.6; Pred. No. 39 Mismatches

DB 22; 0

Length Indels

30; 0;

Gaps

0

15; س

Conservative

۳,

RGGCTAGCTACAACGA 16 AGGCTAGCTACAACGA

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target cell produces an RNA template which is reverse transcribed to produce ss-cDNA of a specified sequence. The ss-cDNA folds back on itself as a result of the inverted tandem repeat, to form a stem-loop structure. The loop is comprised of the sequence of interest. The cDNA transcript is bound to an endogenous nucleic acid target to alter expression of the target sequence. This method is useful for altering the expression of gene products e.g. c-myc or a viral gene product. It may be applied to gene therapy, with target genes mutated or introduced for therapeutic purposes, such as gene inactivation using duplex or triplex binding of nucleic acids, site-directed mutagenesis, interruption of cellular function by binding to specific cellular proteins and interfering with
                                                                                                                                                                                                                                                                       The sequence represents a synthetic single stranded cDNA. This DNA in a target cell and is transfected with a cassette comprising a rof interest flanked by inverted trandem repeats (ITR) and a primer site (PBS) 3' to the tandem repeat. Transcription of the cassette
Sequence 30 BP; 5 A; 8 C; 8 G; 9 T; 0 other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    04-OCT-1999; 99US-0411568.
28-FEB-2000; 2000US-0514707.
                                      RNA splicing
                                                                                                                                                                                                                                                                                                                                                                       Disclosure; Page 43; 61pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                            therapy comprises the expression of a specific antisense sequence
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US-09-536-393-20
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              Sequence 20, Application US/09536393

Patent No. 6522570

GENERAL INFORMATION:
APPLICANT: Rosel, John J.
APPLICANT: Scherr, Michaela
APPLICANT: Riggs, Arthur D.
TITLE OF INVENTION: Method for Identifying Accessible Binding Sites on
FILE REPERENCE: 1954-285

FILE REPERENCE: 1954-285
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SOFTWARE: PatentIn Ver. 2.1
SEQ ID NO 19
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APPLICANT: Scherr, Michaela
APPLICANT: Scherr, Michaela
APPLICANT: Riggs, Arthur D.
TITLE OF INVENTION: Method for Identifying Accessible Binding Sites on
FILE REFERENCE: 1954-285
CURRENT APPLICATION NUMBER: US/09/536,393
CURRENT FILING DATE: 2000-03-28
EARLIER APPLICATION NUMBER: 60/127,529
EARLIER FILING DATE: 1999-04-02
CURRENT APPLICATION NUMBER: US/09/536,393
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                TYPE: DNA
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US-09-397-787-6
US-08-956-307B-6
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US-08-472-255A-139
US-08-472-255A-139
US-08-479-724A-139
US-08-479-724A-139
US-08-479-724A-165
US-08-479-724A-165
US-08-479-256B-139
US-08-952-793-139
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US-08-219-012-84
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; CURRENT FILING DATE: 2000-03-28
; EARLIER APPLICATION NUMBER: 60/127,529
; EARLIER FILING DATE: 1999-04-02
; NUMBER OF SEQ ID NOS: 31
; SOFTMARE: PatentIn Ver. 2.1
; SEQ ID NO 20
; LENGTH: 16
; TYPE: DNA
; ORGANISM: Artificial Sequence
; FEATURE:
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APPLICANT: TOGG, Alison
APPLICANT: Tuery, Caroline
APPLICANT: Toggraphy, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Met
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
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Best Local Similarity 93.8
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APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           SEQ ID NO 23
LENGTH: 29
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Best Local S
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PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
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Pred. No. 4;
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LENGTH: 29
SEQ ID NO 5
LENGTH: 31
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Best Local
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APPLICANT: Fuery, Caroline
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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                                TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related FILE OF INVENTION: Molecules And Kits FILE REFERENCE: JJ1770SequenceListing CURRENT APPLICATION NUMBER: US/09/253,955
CURRENT FILING DATE: 1999-02-22
EARLIER APPLICATION NUMBER: 60/076,899
EARLIER APPLICATION NUMBER: 60/076,899
EARLIER FILING DATE: 1998-03-05
NUMBER OF SEQ ID NOS: 11
SOFTWARE: Patentin Ver. 2.0
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APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
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TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
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                                                                 US-09-270-140A-42
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US-09-637-405-5
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                                                                                                                                                                 NUMBER OF SEQ ID NOS: 96
SOFTWARE: PatentIn Ver. 2
SEQ ID NO 42
LENGTH: 31
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GENERAL INFORMATION:
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Patent No. 62011
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APPLICANT: Fuery, Caroline J
APPLICANT: Puery, Caroline J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid
TITLE OF INVENTION: Molecules And Kits
FILE REFERENCE: JJ1770SequenceListing
CURRENT APPLICATION NUMBER: US/09/637,405
CURRENT FILING DATE: 2000-08-11
                                                                                                                                                                                                                               CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
                                                                                                                                                                                                                                                               APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairis, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J179
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
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EARLIER FILING DATE: 1999-02-22
NUMBER OF SEQ ID NOS: 11
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                                                                          FEATURE: OTHER INFORMATION: Description of Artificial Sequence: DNAzyme OTHER INFORMATION: codon 542 - Cystic Fibrosis
                                                                                                                                ORGANISM: Artificial Sequence
                                                                                                                                                 TYPE: DNA
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SEQ ID NO 48
LENGTH: 31
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
                                                                                                                                                                                                                                                                                              APPLICANT: Todd, Alison
APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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 GGGCTAGCTACAACGA 24
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ilarity 93.8%;
Conservative
                                                                   Conservative
                                                                                     97.5%;
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Pred. No. 4.2;
1; Mismatches
                                                                                       Score 15.6; DI Pred. No. 4.2;
                                                                      Mismatches
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; OTHER INFORMATION: Description of Artificial Sequence:DNAzyme for ; OTHER INFORMATION: Codon 51 - mutant (G to A) US-09-270-140A-51
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                                                                                                                            ; OTHER INFORMATION: PCR primer US-09-746-985B-5
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SEQ ID NO 51
LENGTH: 31
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                                                                                                                                                                                                            SEQ ID NO 5
LENGTH: 31
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Best Local Similarity
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CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
                                                              Matches
                                                                             Query Match
Best Local Similarity
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CURRENT FILING DATE: 2000-12-21
PRIOR APPLICATION NUMBER: 60/076,899
PRIOR FILING DATE: 1998-03-05
                                                                                                                                                                                                                                                                                                                                                                                              APPLICANT: Todd,
APPLICANT: Fuer
APPLICANT: Cair
                                                                                                                                                                                                                                             NUMBER OF SEQ ID NOS: 11 SOFTWARE: PatentIn Ver. 2.0
                                                                                                                                                                                                                                                                                                                                                            TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
                                                                                                                                                                                                                                                                                                                                                 FILE REFERENCE: SequenceListing
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                                                                                                                                                                             ORGANISM: Artificial Sequence
                                                                                                                                                                                                TYPE: DNA
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                               REGETAGETACAACGA 16
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93.8%;
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93.8%;
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Pred. No. 4
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Pred. No. 4.
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RESULT 13
US-09-270-140A-12
; Sequence 12, Application US/09270140A
; Patent No. 6361941
; GENERAL INFORMATION:

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RESULT 15
US-09-270-140A-19
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       GENERAL INFORMATION:
APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                           APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: JaJ1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOPTMARE: Patentin Ver. 2.1
SEQ ID NO 15
LENGTH: 32
TYPE: DNA
ORGANISM: Artificial Sequence
                                                                                                         Sequence 19, Application US/09270140A Patent No. 6361941
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SEQ ID NO 12
LENGTH: 32
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Mur
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TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
FILE REFERENCE: J&J1799
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                                                                                                                                                                                                                                                                                                                                                                                          OTHER INFORMATION: Description of Artificial Sequence: DNAzyme OTHER INFORMATION: H-ras codon 61
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          OTHER INFORMATION: Description of Artificial Sequence: DNAzyme for OTHER INFORMATION: H-ras codon 61, position 1-mutant
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93.8%;
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Pred. No. 4.2;
1; Mismatches
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Pred. No. 4.2;
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GENERAL INFORMATION:
APPLICANT: Todd, Alison
APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
ITILE OF INVENTION: Catalytic Nucleic Acid base Dis
FILE REFERENCE: JA:1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: PatentIn Ver. 2.1
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US-09-270-140A-58
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US-09-270-140A-28
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SEQ ID NO 28
LENGTH: 32
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Patent No. 6361941
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SOFTWARE: PATENTIN VET. 2.1
SEQ ID NO 19
LENGTH: 32
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Best Local Similarity
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CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OP INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            PRIOR APPLICATION NUMBER: 60/079,651 PRIOR FILING DATE: 1998-03-27
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  TYPE: DNA
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Local Similarity 100.0%; P
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Pred. No. 4.2;
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RESULT 19
US-09-270-140A-53
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                 SOFTWARE: PatentIn Ver. 2.1
SEQ ID NO 53
LENGTH: 34
TYPE: DNA
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LENGTH: 32
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Best Local Similarity
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Best Local Similarity
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CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR EILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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                                                                                                                                  FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
                                                                                                                                                                                  APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
                                                                                                    PRIOR APPLICATION NUMBER: 60/079,651 PRIOR FILING DATE: 1998-03-27
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APPLICANT: Fuery, Caro
                                                                                    NUMBER OF SEQ ID NOS: 96
                                                                                                                                                                                                                                       APPLICANT: Todd, Alison
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TYPE: DNA ORGANISM: Artificial Sequence FEATURE:
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OTHER INFORMATION:
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ORGANISM: Artificial Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DNA
                                                                                                                                                                                                                                                         INFORMATION:
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o. 6361941
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93.8%;
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Pred. No. 4.
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; OTHER INFORMATION: Description of Artificial Sequence:DNAzyme for ; OTHER INFORMATION: codon 08 - wildtype US-09-270-140A-53
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                                                   ; OTHER INFORMATION: Description of Artificial Sequence:DNAzyme US-09-270-140A-6
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Best Local Similarity
Matches 15; Conserv
Query Match
Best Local Similarity
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Best Local Similarity
Matches 16; Conserv
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LENGTH: 35
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APPLICANT: Fuery, Caroline
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Mur
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                                                                                                          LENGTH: 35
TYPE: DNA
ORGANISM: Artificial Sequence
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97.5%;
93.8%;
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100.0%; Pred. No. 4.2;
live 0; Mismatches
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Pred. No. 4.
Score 15.6; D
Pred. No. 4.2;
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US-09-270-140A-31
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LENGTH: 35
TYPE: DNA
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SEQ ID NO 31
LENGTH: 35
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Best Local 9
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Best Local Similarity
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                                                                                                                                                                                                                                                                              APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Patent No.
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APPLICANT: Cairns, Murray
TITLE OP INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REPERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
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                                                                                                                                               FEATURE:
OTHER INFORMATION: Description of Artificial Sequence:DNAzyme
OTHER INFORMATION: codon 74
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6361941
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                                                                                Similarity
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AGGCTAGCTACAACGA 23
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                                                                            97.5%;
93.8%;
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93.8%;
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                                                                              Score 15.6; DB Pred. No. 4.2;
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; OTHER INFORMATION: Description of Artificial Sequence:DNAzyme ; OTHER INFORMATION: codon 215.- mutant US-09-270-140A-36
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US-09-270-140A-36
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                                                                      Query Match
Best Local Similarity
Matches 15; Conserv
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APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
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LENGTH: 38
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LENGTH: 38
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Best Local Similarity 93.8%;
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                                                                                                                                                                                                                                                                                             APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
ERIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
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CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
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SOFTWARE: PatentIn Ver. 2.1
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
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APPLICANT: Fuery, Caro
APPLICANT: Cairns, Mur
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      FEATURE:
OTHER INFORMATION: Description of Artificial Sequence: DNAzyme for OTHER INFORMATION: codon 215 - mutant (C to U or A)
                                                                                                                                                                                                                   TYPE: DNA
ORGANISM: Artificial Sequence
                                                                                                                                                                                                      FEATURE:
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                     1 RGGCTAGCTACAACGA 16
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GGGCTAGCTACAACGA
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                                                                                         Score 15.6;
Pred. No. 4.
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RESULT 26 US-09-270-140A-91 ; Sequence 91, Application US/09270140A

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                                                                                                                                                    RESULT 28
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                                                                                                                                                                                                                                                                                                                                                                                                                                           CURRENT APPLICATION NUMBER: US/09/270,140A CURRENT FILING DATE: 1999-03-16 PRIOR APPLICATION NUMBER: 60/079,651 PRIOR FILING DATE: 1998-03-27 NUMBER OF SEQ ID NOS: 96 SOFTWARE: Patentin Ver. 2.1 SEQ ID NO 94
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SEQ ID NO 91
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                           Sequence 85, Application US/08849567A
Patent No. 6326174
GENERAL INFORMATION:
APPLICANT: Joyce, Gerald F.
APPLICANT: Breaker, Ronald R.
TITLE OF INVENTION: ENZYMATIC DNA MOLECULES
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Patent No. 63619
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Best Local
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CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEO ID NOS: 96
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 APPLICANT: Todd, Alison
APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
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APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/08/849,567A
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NT: Todd, Alison
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Pred. No. 4.
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US-08-849-567A-87
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PRIOR APPLICATION NUMBER: PCT/U
PRIOR FILING DATE: 1995-12-01
PRIOR APPLICATION NUMBER: 08/47
PRIOR FILING DATE: 1995-06-07
PRIOR APPLICATION NUMBER: 08/34
PRIOR FILING DATE: 1994-12-02
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SEQ ID NO 85
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                                                                                               GENERAL INFORMATION:
                                                                                                                 Sequence 81, Application US/08849567A Patent No. 6326174
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PRIOR FILING DATE: 1994-12-02
NUMBER OF SEQ ID NOS: 101
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CURRENT FILING DATE: 1997-08-25
PRIOR APPLICATION NUMBER: PCT/US95/15580
PRIOR FILING DATE: 1995-12-01
PRIOR APPLICATION NUMBER: 08/472,194
PRIOR FILING DATE: 1995-06-07
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APPLICANT: Breaker, Ronald R.
TITLE OF INVENTION: ENZYMATIC DNA MOLECULES
                                            APPLICANT: Joyce, Gerald F.
APPLICANT: Breaker, Ronald R.
TITLE OF INVENTION: ENZYMATIC DNA MOLECULES
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     FILE REFERENCE:
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FILE REFERENCE: SCR19438
CURRENT APPLICATION NUMBER: US/08/849,567A
CURRENT FILING DATE: 1997-08-25
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Pred. No. 4
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PRIOR APPLICATION NUMBER: PRIOR FILING DATE: 1995-1

1995-12-01

08/472,194 PCT/US95/15580

APPLICATION NUMBER:

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RESULT 32
US-09-637-405-8/c
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GENERAL INFORMATION:
APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods,
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods,
TITLE REFERENCE: J017708squenceListing
CURRENT APPLICATION NUMBER: US/09/637,405
CURRENT FILING DATE: 2000-08-11
EARLIER APPLICATION NUMBER: 09/253,955
EARLIER FILING DATE: 1999-02-22
NUMBER OF SEQ ID NOS: 11
                                                                                                                                                                                                                                       Sequence 8, Application US/09637405 Patent No. 6201113
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APPLICANT: Fuery, Caroline J
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
FILE OF INVENTION: Molecules And Kits
FILE REFERENCE: JJ1770SequenceListing
CURRENT APPLICATION NUMBER: US/09/253,955
CURRENT FILING DATE: 1999-02-22
CURRENT FILING DATE: 1999-03-05
BARLIER APPLICATION NUMBER: 60/076,899
EARLIER FILING DATE: 198-03-05
NUMBER OF SEQ ID NOS: 11
SOFTMARE: Patentin Ver. 2.0
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EQ ID NO 81
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PRIOR APPLICATION NUMBER: 08/
PRIOR FILING DATE: 1994-12-02
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93.8%;
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Pred. No. 4.3;
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; LENGTH: 50
; TYPE: DNA
; ORGANISM: synthetic
US-09-637-405-8
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                                                                                                                                                                                                                                                                                                                                                                                             RESULT 34
US-08-849-567A-86
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ; OTHER INFORMATION: PCR primer US-09-746-985B-8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         US-09-746-985B-8/c
                                                                                                        FILE REFERENCE: SCR19438
CURRENT APPLICATION NUMBER: US/08/849,567A
CURRENT FILING DATE: 1997-08-25
PRIOR APPLICATION NUMBER: PCT/US95/15580
PRIOR FILING DATE: 1995-12-01
PRIOR APPLICATION NUMBER: 08/472,194
PRIOR APPLICATION NUMBER: 08/349,023
PRIOR APPLICATION NUMBER: 08/349,023
PRIOR FILING DATE: 1994-12-02
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       SEQ ID NO 8
LENGTH: 50
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                                                      SOFTWARE: 1
SEQ ID NO 86
                                                                                                                                                                                                                                                                                                                                      GENERAL INFORMATION:
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
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Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
TITLE OF INVENTION: Molecules And Kits
FILE REFERENCE: SequenceListing
CURRENT APPLICATION NUMBER: US/09/746,985B
CURRENT FILING DATE: 2000-12-21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      PRIOR APPLICATION NUMBER: 60/
PRIOR FILING DATE: 1998-03-05
NUMBER OF SEQ ID NOS: 11
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APPLICANT: Fuery, Caroli
APPLICANT: Cairns, Murra
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                                                                                           NUMBER OF SEQ ID NOS:
                                                                                                                                                                                                                                                                            APPLICANT: Breaker, Ronald R.
TITLE OF INVENTION: ENZYMATIC DNA MOLECULES
                                                                                                                                                                                                                                                                                                 APPLICANT: Joyce, Gerald F. APPLICANT: Breaker, Ronald
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ORGANISM: Artificial Sequence FEATURE:
                   TYPE: DNA
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ORGANISM: Artificial Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  LENGTH: 50
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                                                                         PatentIn Ver.
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93.8%;
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Pred. No. 4
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Pred. No. 4.3;
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; FEATURE: ; OTHER INFORMATION: Description of Artificial Sequence: DNA enzyme US-08-849-567A-86

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11

Matches

15;

Conservative

Query Match Best Local Similarity

97.5%;

Score 15.6; Pred. No. 4.

В

4

Length 51;

Indels

0

Gaps

0;

Mismatches

US-09-253-955-2/c RESULT 35

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                                                                                                      ; SEQ ID NO 2
; LENGTH: 59
; TYPE: DNA
; ORGANISM: synthetic construct
US-09-637-405-2
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                                                                                                                                                                                                                                                                                                                                                                                                               GENERAL INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 2, Application US/09637405 Patent No. 6201113
                                                                     Query Match
                                                                                                                                                                                                           TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related TITLE OF INVENTION: Molecules And Kits FILE REFERENCE: JJ1770SequenceListing CURRENT APPLICATION NUMBER: US/09/637,405 CURRENT FILING DATE: 2000-08-11 EARLIER APPLICATION NUMBER: 09/253,955 EARLIER FILING DATE: 1999-02-22 NUMBER OF SEQ ID NOS: 11
                                                                                                                                                                                                                                                                                                                                                         APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
                                                                                                                                                                                                SOFTWARE: PatentIn Ver. 2.0
                                                      Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        28
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 RGGCTAGCTACAACGA 16
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milarity 93.8%;
Conservative 1
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Pred. No. 4.4;
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                                                                        Length 59
                                            Indels
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Sequence 2, Application US/09253955
Patent No. 6140055
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APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
TITLE OF INVENTION: Molecules And Kits
FILE REFERENCE: JJ1770SequenceListing
CURRENT APPLICATION NUMBER: US/09/253,955
CURRENT FILING DATE: 1998-02-22
EARLIER APPLICATION NUMBER: 60/076,899
EARLIER FILING DATE: 1998-03-05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ORGANISM: synthetic construct -09-253-955-2
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SOFTWARE: PatentIn Ver. 2.0
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nes 15; Conserv
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Pred. No. 4.
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RESULT 39
US-09-637-405-10/c
^~mence 10, Application US/09637405
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US-09-253-955-10/c
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                                                                                                                                                                                                                                                                              SEQ ID NO 10
LENGTH: 60
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Best Local 9
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                                                                                                                                                                                                                                                                    TYPE: DNA
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SEQ ID NO 2 LENGTH: 59

TYPE: DNA

Matches Query Match

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CURRENT APPLICATION UNMBER: US/09/746, CURRENT FILING DATE: 2000-12-21 PRIOR APPLICATION NUMBER: 60/076,899 PRIOR FILING DATE: 1998-03-05 NUMBER OF SEQ ID NOS: 11 SOFTWARE: Patentin Ver. 2.0 SEQ ID NO 2
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US-09-746-985B-2/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ; OTHER INFORMATION: PCR primer US-09-7,46-985B-2
                                                                                                                                                             ORGANISM: synthetic construct US-09-253-955-10
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              GENERAL INFORMATION:
APPLICANT: Tood, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
TITLE OF INVENTION: Molecules And Kits
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 2, Application US/09746985B Patent No. 6365724
                                                                                                                                                                                                                                                                                 GENERAL INFORMATION:
APPLICANT: Todd, Alison V
APPLICANT: Todd, Alison V
APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
APPLICANT: Cairns, Murray J
APPLICANT: Cairns, Murray J
APPLICANT: Cairns, Murray J
APPLICANT: Cymogenic Nucleic Acid Detection Methods, And Related
TITLE OF INVENTION: Molecules And Kits
FILE REFERENCE: JU1770SequenceListing
CURRENT APPLICATION NUMBER: US/09/253,955
CURRENT APPLICATION NUMBER: US/09/253,955
CURRENT FILING DATE: 1998-03-05
EARLIER FILING DATE: 1998-03-05
EARLIER FILING DATE: 1998-03-05
EARLIER FILING DATE: 1998-03-05
EARLIER FILING DATE: 1998-03-05
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Best Local Similarity
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Patent No. 6140055
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                                                                                                                                                                                                                                                                SOFTWARE: PatentIn Ver. 2.0
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32 GĠĠĊŢĀĠĊŢĀĊĀĀĊĠĀ
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                                    1 RGGCTAGCTACAACGA 16
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                                                                                                   Similarity
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                                                                                 Score 15.6; D
Pred. No. 4.4;
1; Mismatches
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Pred. No. 4
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Patent No. 6201113

GENERAL INFORMATION:
APPLICANT: Todd, Alison V
APPLICANT: Todd, Alison V
APPLICANT: Fuery, Caroline J
APPLICANT: Fuery, Caroline J
APPLICANT: Cairns, Murray J
TITLE OF INVENTION: Zymogenic Nucleic Acid Detection Methods, And Related
TITLE OF INVENTION: Molecules And Kits
TITLE OF INVENTION NUMBER: US/09/637,405
CURRENT APPLICATION NUMBER: US/09/637,405
CURRENT FILING DATE: 2000-08-11
EARLIER APPLICATION NUMBER: 09/253,955
EARLIER FILING DATE: 1999-02-22
NUMBER OF SEQ ID NOS: 11
SOFTWARE: PatentIn Ver. 2.0
SEQ ID NO 10
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                RESULT 40
US-09-270-140A-95/c
; Sequence 95, Application US/09270140A
parent No. 6361941
parent No. 6371941
Search completed: January 21, 2004, 08:17:05 Job time : 60 secs
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                                                                                                                                                                                                                                                                       ; LENGTH: 60
; TYPE: DNA
; ORGANISM: Artificial Sequence
; PEATURE:
; OTHER INFORMATION: Description of Artificial Sequence:3" zymogene
; OTHER INFORMATION: primer eK42Dz2
US-09-270-140A-95
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; TYPE: DNA
; ORGANISM: Synthetic construct
US-09-637-405-10
                                                                                                                                                                                                                                                                                                                                                                                                                             APPLICANT: Fuery, Caroline
APPLICANT: Cairns, Murray
TITLE OF INVENTION: Catalytic Nucleic Acid base Diagnostic Methods
FILE REFERENCE: J&J1799
CURRENT APPLICATION NUMBER: US/09/270,140A
CURRENT FILING DATE: 1999-03-16
PRIOR APPLICATION NUMBER: 60/079,651
PRIOR FILING DATE: 1998-03-27
NUMBER OF SEQ ID NOS: 96
SOFTWARE: Patentin Ver. 2.1
SEQ ID NO 95
                                                                                                                                                                             Query Match 97.5%; Score 15.6; DB 4; Best Local Similarity 93.8%; Pred. No. 4.4; Matches 15; Conservative 1; Mismatches 0;
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32 GGGCTAGCTACAACGA 17
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32 GGGCTAGCTACAACGA 17
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Result
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Maximum
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PRIOR APPLICATION NUMBER: 60/187,128
PRIOR FILING DATE: 2001-03-06
PRIOR FILING DATE: 2000-03-06
NUMBER OF SEQ ID NOS: 49
SOFTWARE: PatentIn version 3.0
SEQ ID NO 21
LENGTH: 16
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Query Match
Best Local Similarity
                                 ORGANISM: Artificial Sequence FEATURE:
OTHER INFORMATION: Description
-09-877-526A-21
                                                                                                                                                                                                                                                                                                                                                                                                                                   APPLICANT: Blatt, Larry
APPLICANT: Vaish, Narenda
TITLE OF INVENTION: A PROCESS for the Detection of Nucleic Acid Using Nucleic Acid
FILE REFERENCE: MBNB00-816-C (700/002)
CURRENT APPLICATION NUMBER: US/09/877,526A
CURRENT FILING DATE: 2001-03-06
                                                                                                                                                                                                                                                                              APPLICANT: Ribozyme Pharmaceuticals, APPLICANT: Usman, Nassim APPLICANT: McSwiggen, Jim
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                                                                                 TYPE: DNA
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Seiwert, Scott
Haeberli, Pete
Chowrira, Bharat
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Pred. No.
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US-09-730-289B-3172
US-09-730-289B-3173
                                              of Artificial Sequence:
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             DB
             10;
             Length 16;
                                              Enzymatic Nucleic
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APPLICANT: Draper, Ken
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Enzymatic Nucleic Acid
TITLE OF INVENTION: Levels of NF-Kappa B
FILE REFERENCE: 400/022 (MBHB00-812-D)
CURRENT APPLICATION NUMBER: US/09/864,785
CURRENT FILING DATE: 2001-05-23
NUMBER OF SEQ ID NOS: 3929
SOFTWARE: Patentin version 3.0
SEQ ID NO 3928
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NUMBER OF SEQ ID NOS: 15
SOFTWARE: PatentIn version 3.0
SEQ ID NO 15
LENGTH: 16
TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
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APPLICANT: Zwick, Michael
APPLICANT: Jarvis, Thale
APPLICANT: Woolf, Todd
APPLICANT: Woolf, Todd
APPLICANT: Matulic-Adamic, Jasenka
TITLE OF INVENTION: Nucleic Acid Molecules with No
TITLE OF INVENTION: Modulating Gene Expression
FILE REFERENCE: MBHB00, 873-H 500/004
CURRENT APPLICATION NUMBER: US/09/866,316B
CURRENT FILING DATE: 2002-03-05
PRIOR APPLICATION NUMBER: US 09/103,656
PRIOR FILING DATE: 1998-06-23
PRIOR APPLICATION NUMBER: US 60/082,404
PRIOR APPLICATION NUMBER: US 60/082,404
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US-09-866-316B-15
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Patent No. US20020177568A1
GENERAL INFORMATION:
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Best Local
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APPLICANT:
APPLICANT:
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APPLICANT: Stinchcomb, Dan
APPLICANT: Draper, Ken
APPLICANT: McSwiggen, Jim
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TYPE: DNA ORGANISM: Artificial Sequence FEATURE:
                                                        ENGTH: 16
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Karpeisky, Alex
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Pred. No. 23;
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Matches
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 Query Match
                                                                                                                                SEQ ID NO 3896
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APPLICANT:
APPLICANT:
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TITLE OF INVENTION: Nucleic Acid Sensor Molecules
FILE REFERENCE: MBHB00-816-D (700/004)
CURRENT APPLICATION NUMBER: US/09/992,160
CURRENT FILING DATE: 2001-11-05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Publication
                                                                                                                                                                                                             CURRENT APPLICATION NUMBER: US/09/730,289B CURRENT FILING DATE: 2000-12-05
                                                                                                                                                                                                                                           APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Method and Reagent for Treatment of Cardiac Disease
FILE REFERENCE: MBHB00-864-A (400/006)
                                                                                                                                                                                                                                                                                                                             ENERAL INFORMATION
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SOFTWARE: PatentIn version 3.0 EQ ID NO 21
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PRIOR FILING DATE: 1999-12-06
NUMBER OF SEQ ID NOS: 3897
SOFTWARE: Patentin version 3.0
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                                                                                            LENGTH: 16
TYPE: DNA
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TYPE: DNA
ORGANISM: Artificial Sequence
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                                                                                                                                                                                                                                                                                           Blatt, Larry
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Zinnen, Shawn
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Chowrira, Bharat
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                                               Description
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100.0%; Pred. No. 23;
tive 0; Mismatches
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100.0%; Pred. No. 23;
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RESULT 7
US-09-877-478-6585
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APPLICANT: Blatt, Larry
APPLICANT: McSwiggen, Jim
                                    PRIOR APPLICATION NUMBER: US 08/193,627
PRIOR FILING DATE: 1994-02-07
PRIOR APPLICATION NUMBER: US 08/433,993
PRIOR FILING DATE: 1995-05-04
PRIOR APPLICATION NUMBER: US 08/434,504
PRIOR APPLICATION NUMBER: US 08/434,504
                                                                                                                                                                                                                                                 CURRENT FILING DATE: 2001-12-31
PRIOR APPLICATION NUMBER: US 07/882,712
PRIOR FILING DATE: 1992-05-14
PRIOR APPLICATION NUMBER: US 09/531,025
PRIOR FILING DATE: 2000-03-20
                                                                                                                                                                                                                                                                                                                                          APPLICANT: McSwiggen, Jim
APPLICANT: McSrissey, Dave
TITLE OF INVENTION: Method and Reagent for Inhibiting Hepatitis
FILE REFERENCE: MBHB00-845-H (400/029)
CURRENT APPLICATION NUMBER: US/09/877,478
CURRENT FILING DATE: 2001-12-31
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APPLICANT: McSwiggen, Jim
APPLICANT: Chowrira, Bharat
APPLICANT: Haeberli, Pete
TITLE OF INVENTION: Method and Reagent for the Inhibition
FILE REFERENCE: MBHB00,878-A (400/011)
                                                                                                                                                     PRIOR APPLICATION NUMBER: US 09/636,385
PRIOR FILING DATE: 2000-08-09
PRIOR APPLICATION NUMBER: US 09/696,347
PRIOR FILING DATE: 2000-10-24
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                     FILING DATE: 1995-05-04
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                                                 FILE REFERENCE: MBHB00-955-A (400/008)
CURRENT APPLICATION NUMBER: US/09/776,474
CURRENT FILING DATE: 2001-02-02
PRIOR APPLICATION NUMBER: US 60/179,983
PRIOR FILING DATE: 2000-03-02
NUMBER OF SEQ ID NOS: 2992
SOFTWARE: Patentin version 3.0
SEQ ID NO 2991
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US-09-848-754A-9645
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SOFTWARE: PatentIn version 3.0
SEQ ID NO 9645
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GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals, Inc.
TITLE OF INVENTION: Enzymatic Nucleic Acid Treatment of Diseases or Conditions Relate
TITLE OF INVENTION: Levels of Epidermal Growth Factor Receptors
FILE REFERENCE: MEHB00-958-1 (400/018)
CURRENT APPLICATION NUMBER: US/09/848,754A
CURRENT FILING DATE: 2001-05-03
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Best Local Similarity
Matches 16; Conserv
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GENERAL INFORMATION
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SOFTWARE: PatentIn version
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TITLE OF INVENTION: Method and Reagent for the Inhibition of Checkpoint Kinase-1 (CHK
TITLE OF INVENTION: Enzyme
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APPLICANT: Holman, Patricia
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TYPE: DNA
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ORGANISM: Artificial Sequence
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tive 0; Mismatches
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APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
FILE OF INVENTION: Method and Reagent for the
FILE REFERENCE: 400/010
CURRENT APPLICATION UMMBER: US/09/780,164
CURRENT FILING DATE: 2001-02-09
PRIOR APPLICATION NUMBER: 60/185,516
PRIOR FILING DATE: 2000-02-28
NUMBER OF SEQ ID NOS: 2603
SOFTWARE: PatentIn version 3.0
SEQ ID NO 2602
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US-09-780-164-2602
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US-09-930-423-4549
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SOFTWARE: PatentIn version 3.0
SEQ ID NO 4549
LENGTH: 16
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Best Local
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Best Local Similarity
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TITLE OF INVENTION: Mcthod and Reagent for the Treatment of Alzheimer's Disease
FILE REFERENCE: MBHBB00,918-A 400/027
CURRENT APPLICATION NUMBER: US/09/930,423
CURRENT FILING DATE: 2001-08-15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                APPLICANT: Ribozyme Pharmaceuticals, APPLICANT: Blatt, Larry APPLICANT: McSwiggen, Jim
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APPLICANT: Blatt, Larry
APPLICANT: McSwiggen, Jim
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Pred. No. :
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Pred. No. 23
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US-10-366-191-14
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                                                                                                                                                         US-10-366-191-14
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                                                                                                                                                                                                                                                                          SOFTWARE: PatentIn version 3.0 SEQ ID NO 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 14, Application US/10366191
Publication No. US20030228590A1
GENERAL INFORMATION:
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Best Local Similarity
Matches 16; Conserv
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APPLICANT: Bharat Chowrira
ITILE OF INVENTION: Method and Reagent for the Inhibition of NOGO and NOGO Receptor PILE REFERENCE: MBHB00-878-C (400/017)
CURRENT APPLICATION NUMBER: US/09/827,395A
CURRENT FILING DATE: 2001-04-05
PRIOR APPLICATION NUMBER: 09/780,533
PRIOR APPLICATION NUMBER: 09/780,533
PRIOR FILING DATE: 2001-02-09
PRIOR FILING DATE: 2001-02-11
NUMBER: OF SEQ ID NOS: 2617
ROUGHER OF SEQ ID NOS: 2617
                                                                                                                                                                                                                                                                                                                                  APPLICANT: Beigelman, Leonid
APPLICANT: Haeberii, Peter
TITLE OP INVENTION: Antibodies Having Specificity for Nucleic Acids
FILE REFERENCE: 02-030-A (900/047)
CURRENT APPLICATION NUMBER: US/10/366,191
CURRENT FILING DATE: 2003-02-12
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                                                                                                                                                                                                                                                                                                                    NUMBER OF SEQ ID NOS: 17
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                                                                                                                                                                                                                                     TYPE: DNA
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RGGCTAGCTACAACGA 16
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                                                                              Conservative
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                                                                            97.5%; Score 15.6; D
100.0%; Pred. No. 23;
cive 0; Mismatches
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100.0%; Pred. No. 23;
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RESULT 14

RESULT 16 US-09-745-237A-4549 ; Sequence 4549, Application US/09745237A ; Publication No. US20030143708A1

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Query Match
Best Local Similarity
Matches 15; Conserva
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; OTHER INFORMATION: catalytic core
US-10-435-044A-19
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US-10-435-044A-20
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LENGTH: 16
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CURRENT FILING DATE: 2003-05-12
PRIOR APPLICATION NUMBER: US 09/536,393
PRIOR FILING DATE: 2000-03-28
PRIOR APPLICATION NUMBER: US 60/127,529
PRIOR APPLICATION NUMBER: US 60/127,529
PRIOR FILING DATE: 1999-04-02
NUMBER OF SEQ ID NOS: 31
                                                                                                                                                                                                                                                                                                                           PRIOR APPLICATION NUMBER: US 09/536,393
PRIOR FILING DATE: 2000-03-28
PRIOR APPLICATION NUMBER: US 60/127,529
                                                                                                                                                                                                                                                                                                                                                                                   FILE REFERENCE: 1954-285ii
CURRENT APPLICATION NUMBER: US/10/435,044A
CURRENT FILING DATE: 2003-05-12
                                                                                                                                                                                                                                                                                                                                                                                                                                 APPLICANT: Rossi, John J
APPLICANT: Scherr, Michaela
APPLICANT: Riggs, Arthur D
TITLE OF INVENTION: Method for Identifying Accessible Binding Sites on RNA
                                                                                                                                                                                                                                                                        SOFTWARE: PatentIn version 3.1
                                                                                                                                                                                                                                                                                           NUMBER OF SEQ ID NOS: 31
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APPLICANT: Riggs, Arthur D
TITLE OF INVENTION: Method For Identifying Accessible Binding Sites on
FILE REFERENCE: 1954-2851i
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APPLICANT: Scherr, Micha
APPLICANT: Riggs, Arthu
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ORGANISM: Artificial Sequence
                                                                                                                                                                                TYPE: DNA ORGANISM: Artificial Sequence FEATURE:
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llarity 93.8%;
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                                                                                      Score 15.6;
Pred. No. 2
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Pred. No. 2
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                                     RESULT 18
US-10-279-401-11
Sequence 11, Application US/10279401
Publication No. US20030140362A1
GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals Inc.
APPLICANT: Macejak, Dennis
APPLICANT: Lee, Patrice
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APPLICANT: Blatt, Larry
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Method and Reagent for the Treatment of Alzheimer's Disease
TITLE REFERENCE: 400/007 (MSHB00-918-A)
CURRENT APPLICATION NUMBER: US/09/745,237A
CURRENT APPLICATION UNMER: US/09/745,237A
CURRENT FILING DATE: 2002-04-15
UNMBER OF SEQ ID NOS: 4550
SOPTWARE: Patentin version 3.0
SEQ ID NO 4549
LENGTH: 16
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Best Local
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APPLICANT: Jarvis, Thale
APPLICANT: Von Carlowitz, Ira
APPLICANT: McSwiggen, Jim
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                     TITLE OF INVENTION:
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Hamblin, Paul
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N: In Vivo Models For Screening Inhibitors of Hepatitis
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100.0%; Pred. No. 23;
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100.0%; Pred. No. 7
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US-10-201-389A-13
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           APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, James
APPLICANT: McSwiggen, James
TITLE OF INVENTION: Nucleic Acid Treatment of
FILE REFERENCE: 400/057 (MBHB01-1158-A)
CURRENT APPLICATION NUMBER: US/10/238,700
CURRENT FILING DATE: 2002-09-18
PRIOR APPLICATION NUMBER: PCT/US 02/16840
PRIOR FILING DATE: 2002-05-29
PRIOR FILING DATE: 2002-05-29
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Best Local (
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Best Local Similarity
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PRIOR FILING DATE: 2001-10-24
PRIOR APPLICATION NUMBER: PCT/US02/09187
PRIOR FILING DATE: 2002-03-26
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CURRENT FILING DATE: 2002-07-22
NUMBER OF SEQ ID NOS: 23
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TITLE OF INVENTION: ENZYMATIC NUCLEIC ACID
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ORGANISM: Artificial Sequence
FEATURE:
OTHER INFORMATION: Description of Artificial Sequence: DNAzyme Motif
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FEATURE:
OTHER INFORMATION: Description of Artificial Sequence: DNAzyme motif
PRIOR APPLICATION NUMBER:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TYPE: DNA
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hes 16; Conserv
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Azhayeva, Elena
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3ER: US 60/296,876
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   60/318,471
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Pred. No. :
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                                                                                                                 of Diseases or Conditions Related to Level
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APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: Fosnaugh, Kathy
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: METHOD AND REAGENT FOR TH
FILE REFERENCE: 400/056 (MBHB01-1110)
CURRENT APPLICATION NUMBER: US/10/230,006
CURRENT FILING DATE: 2002-11-18
PRIOR APPLICATION NUMBER: US 60/315,315
PRIOR APPLICATION NUMBER: US 60/315,315
PRIOR PILING DATE: 2001-08-28
NUMBER OF SEQ ID NOS: 2678
SOFTWARE: Patentin version 3.0
SEQ ID NO 2677
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US-10-277-494-445
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NUMBER OF SEQ ID NOS: 4666
SOFTWARE: PatentIn version 3.0
SEQ ID NO 4666
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level TITLE OF INVENTION: Epidermal Growth Factor Receptors FILE REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              APPLICANT: Ribozyme Pharmaceuticals, Inc. APPLICANT: McSwiggen, Jim
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                                 ORGANISM: Artificial Sequence
                                                         LENGTH: 16
TYPE: DNA
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INFORMATION: Description of Artificial Sequence:
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o. US20030186909A1
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100.0%; Pred. No. 23;
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                                                                                      ; OTHER INFORMATION: Description of Artificial Sequence:
US-10-151-116-12
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Query Match
Best Local Similarity lou.
Thes 16; Conservative
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LENGTH: 16
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 12, Application US/10151116 Publication No. US20030104985A1
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                                                                                                                                                                                                                   CURRENT APPLICATION NUMBER: US/10/151,116
CURRENT FILING DATE: 2002-05-17
PRIOR APPLICATION NUMBER: 60/362,016
PRIOR FILING DATE: 2002-03-06
PRIOR PPLICATION NUMBER: 60/292,217
PRIOR PILING DATE: 2001-05-18
NUMBER OF SEQ ID NOS: 12
                                                                                                                                                                                                                                                                                                                                                                       APPLICANT: Ribozyme Pharmaceuticals, APPLICANT: Matulic-Adamic, Jasenka APPLICANT: Beigelman, Leo
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SOFTWARE: PatentIn version 3.0
                                                                                                                                                                                                                                                                                                                                      APPLICANT: Beigelman, Leo
TITLE OF INVENTION: Conjugates and Compositions
FILE REFERENCE: MBHB 01,639-B (600/020)
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TITLE OF INVENTION: Method and Reagent for the Modulation of Female Reproductive TITLE OF INVENTION: Conditions
FILE REFERENCE: 01-1735-A (400/070)
CURRENT APPLICATION NUMBER: US/10/306,747A
CURRENT FILING DATE: 2002-11-27
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                                                                                                                                     ORGANISM: Artificial Sequence
                                                                                                                                                        TYPE: DNA
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100.0%; Pred. No. 23;
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                      Score 15.6; DE ;; Pred. No. 23; 0; Mismatches
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Pred. No. 23;
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GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic acid treatment of
TITLE OF INVENTION: HER2
FILE REPERENCE: MBHBD1-1653-A (400/014)
FILE REPERENCE: MBHBD1-1653-A (400/014)
CURRENT APPLICATION NUMBER: US/10/163,552
CURRENT FILING DATE: 2002-06-06
CURRENT FILING DATE: 2002-06-06
SEQ ID NOS: 1997
SOFTWARE: PACENTIN VERSION 3.0
SEQ ID NO 1997
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US-10-163-552-1997
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US-10-156-306-8013
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                                                      RESULT 27
US-10-157-580A-170
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APPLICANT: McSwiggen, James

ITTLE OF INVENTION: Enzymatic Nucleic Acid Treatment of Diseases or Conditions Relate

TITLE OF INVENTION: Levels of IKK-Gamma and PKR

FILE REFERENCE: McHB01-664-A (400/050)

CURRENT APPLICATION NUMBER: US/10/156,306

CURRENT FILING DATE: 2002-05-28

NUMBER OF SEQ ID NOS: 8013

SOFTWARE: PatentIn version 3.0

SEQ ID NO-8013
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Best Local
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GENERAL INFORMATION:
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Sequence 170, Application US/10157580A Publication No. US20030124513A1 GENERAL INFORMATION:
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                ORGANISM: Artificial Sequence
                                                                                                                                                                                                                                                                                                                                                                       ENGTH: 16
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o. US20030105051A1
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100.0%; Pred. No. 23;
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100.0%; Pred. No. 23;
live 0; Mismatches
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**PLICANT: Blatt, Lawrence

TITLE OF INVENTION: CONUIGATES AND COMPOSITIONS FOR CELLULAR DELIVERY

FILE REFERENCE: MBHB01-882-B (600/022)

FILE REFERENCE: MBHB01-882-B (600/022)

CURRENT APPLICATION NUMBER: US/10/201,394A

CURRENT FILING DATE: 2002-07-22

NUMBER OF SEQ ID NOS: 22

SOFTWARE: PatentIn version 3.0

SEQ ID NO 13

LENGTH: 16
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US-10-201-394A-13
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TITLE OF INVENTION: Enzymatic Nucleic Acid Treatment of Diseases
TITLE OF INVENTION: Related To Levels Of HIV
TITLE OF INVENTION: Related To Levels Of HIV
FILE REPERENCE: MBHB01-665-A (400/051)
CURRENT APPLICATION NUMBER: US/10/157,580A
CURRENT FILING DATE: 2002-08-30
NUMBER OF SEQ ID NOS: 170
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         Sequence 334, Application US/10277494
Publication No. US20030186909A1
GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
APPLICANT: DOINVENTION: Nucleic Acid Treatment of Diseases
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILLS REFERENCE: MGHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
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NUMBER OF SEQ ID NOS:
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100.0%; Pred. No. 23;
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RESULT 31
US-10-277-494-336
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US-10-277-494-335
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US-10-277-494-335
                                                                                                                                    APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Bpidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: Patentin version 3.0
SEQ ID NO 336
LENGTH: 23
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SOFTWARE: PATENTIN VERSION 3.0
SEQ ID NO 335
LENGTH: 23
                                                FEATURE:
OTHER INFORMATION:
:-10-277-494-336
                                                                                                                                                                                                                                                                                                                                     Publication No. US20 GENERAL INFORMATION:
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Best Local 9
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Best Local Similarity
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CURRENT FILING DATE: 2002-10-21
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SEQ ID NO 334
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                                                                                   LENGTH: 23
TYPE: DNA
ORGANISM: Artificial Sequence
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93.8%; Pred. No. 23;
bive 1; Mismatches
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Pred. No. 23
Score 15.6; DB Pred. No. 23;
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US-10-277-494-337
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CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: Patentin version 3.0
SEQ ID NO 337
LENGTH: 23
TYPE: DNA
                                                               Best Local
Matches 1
                                                                                                                                                                                                                CURRENT FILING DATE: 2002
NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn versior
SEQ ID NO 338
LENGTH: 23
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                                                                                                Query Match
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Best Local
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Publication No. US20030186909A1
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APPLICANT: McGwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level TITLE OF INVENTION: Epidermal Growth Factor Receptors
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                                                                                                                                                                 TYPE: DNA
ORGANISM: Artificial Sequence
FEATURE:
                                                                                                                                                 OTHER INFORMATION: Description of Artificial
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RESULT 34 US-10-277-494-339

Sequence 339, A Publication No.

Application US/10277494 o. US20030186909A1

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RESULT 35
US-10-277-494-340
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US-10-277-494-341
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Matches 15
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Sequence 340, Application US/10277494
Publication No. US20030186909A1
GENERAL INFORMATION:
APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Mucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
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Best Local Similarity
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Publication No. US20030186909A1 
GENERAL INFORMATION:
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APPLICANT: McSwiggen, Jim
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CURRENT APPLICATION NUMBER: US/10/277,494
SEQ ID NO 341
                APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Spidermal Growth Factor Receptors
FILE REFERENCE: MSHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn version 3.0
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SOFTWARE: PatentIn version 3.0
SEQ ID NO 342
LENGTH: 23
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                                                                                                                          CURRENT FILING DATE: 2002-10-2
NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn version 3.0
SEQ ID NO 343
LENGTH: 23
TYPE: DNA
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APPLICANT: Ribozyme Pharmaceuticals, Inc
APPLICANT: McSwiggen, Jim
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Best Local Similarity
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TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILS REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
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TYPE: DNA
ORGANISM: Artificial Sequence
                                                                                                                                                                                                  TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related TITLE OF INVENTION: Epidermal Growth Factor Receptors FILE REFERENCE: MBHB00-958-K (400/064) CURRENT APPLICATION NUMBER: US/10/277,494 CURRENT FILING DATE: 2002-10-21
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                                                                            OTHER INFORMATION: Description of Artificial Sequence:
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Search completed: January 21, 2004, 08:22:20 Job time : 157 secs
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US-10-277-494-344
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APPLICANT: Ribozyme Pharmaceuticals, Inc.
APPLICANT: McSwiggen, Jim
TITLB OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REFERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
NUMBER OF SEQ ID NOS: 446
SOFTWARE: PatentIn version 3.0
SEQ ID NO 345
LENGTH: 23
TYPE: DNA
ORGANISM: Artificial Sequence
PEATURE:
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SOFTWARE: PatentIn version 3.0
SEQ ID NO 344
LENGTH: 23
TYPES
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Best Local Similarity 93.8
Matches 15; Conservative
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APPLICANT: McSwiggen, Jim
TITLE OF INVENTION: Nucleic Acid Treatment of Diseases or conditions Related To Level
TITLE OF INVENTION: Epidermal Growth Factor Receptors
FILE REPERENCE: MBHB00-958-K (400/064)
CURRENT APPLICATION NUMBER: US/10/277,494
CURRENT FILING DATE: 2002-10-21
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                                                                                           GGGCTAGCTACAACGA 19
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o. US20030186909A1
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tive 1; Mismatches
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